Ranger Rick

National Wildlife Federation

June 1988

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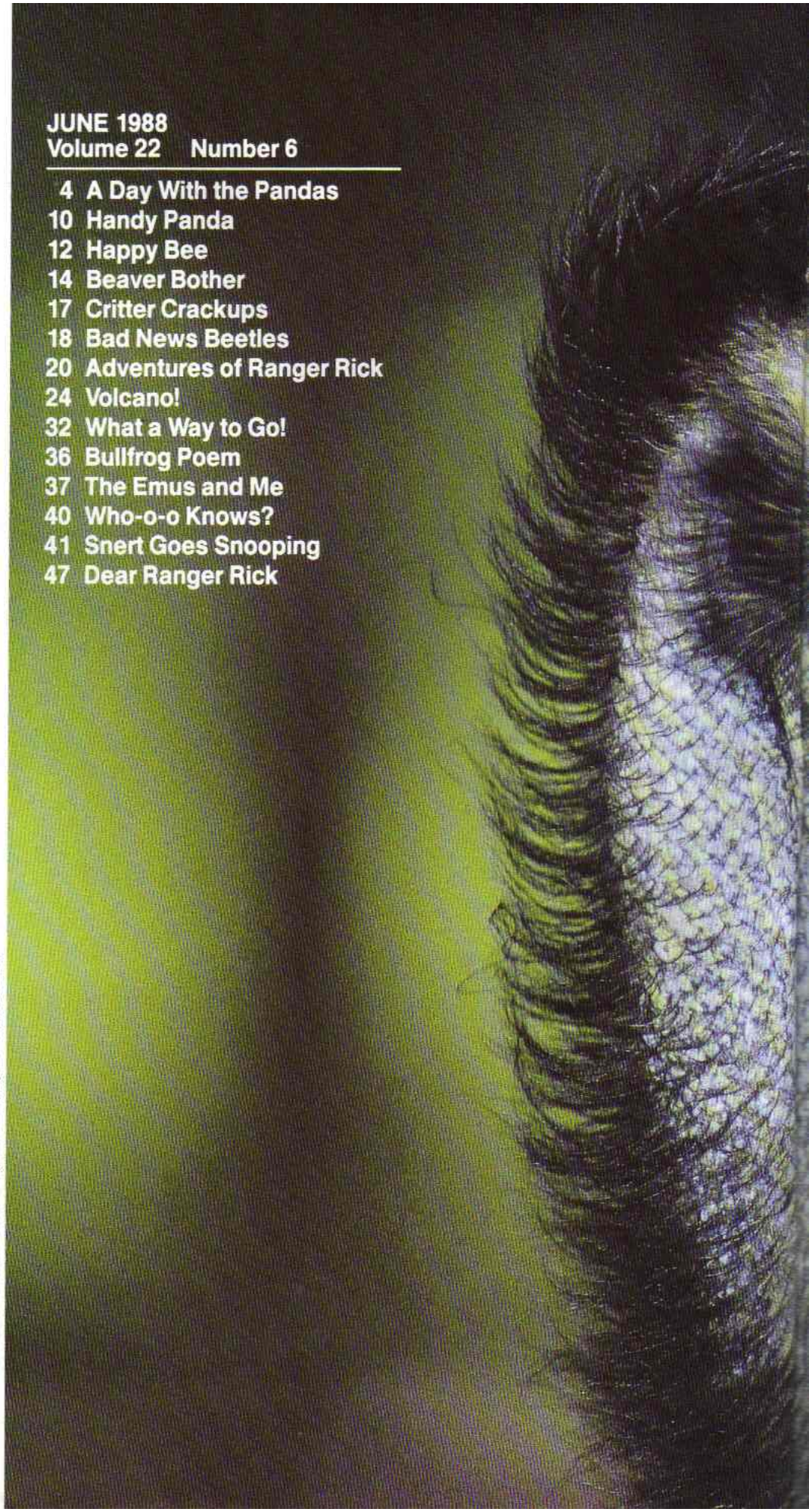
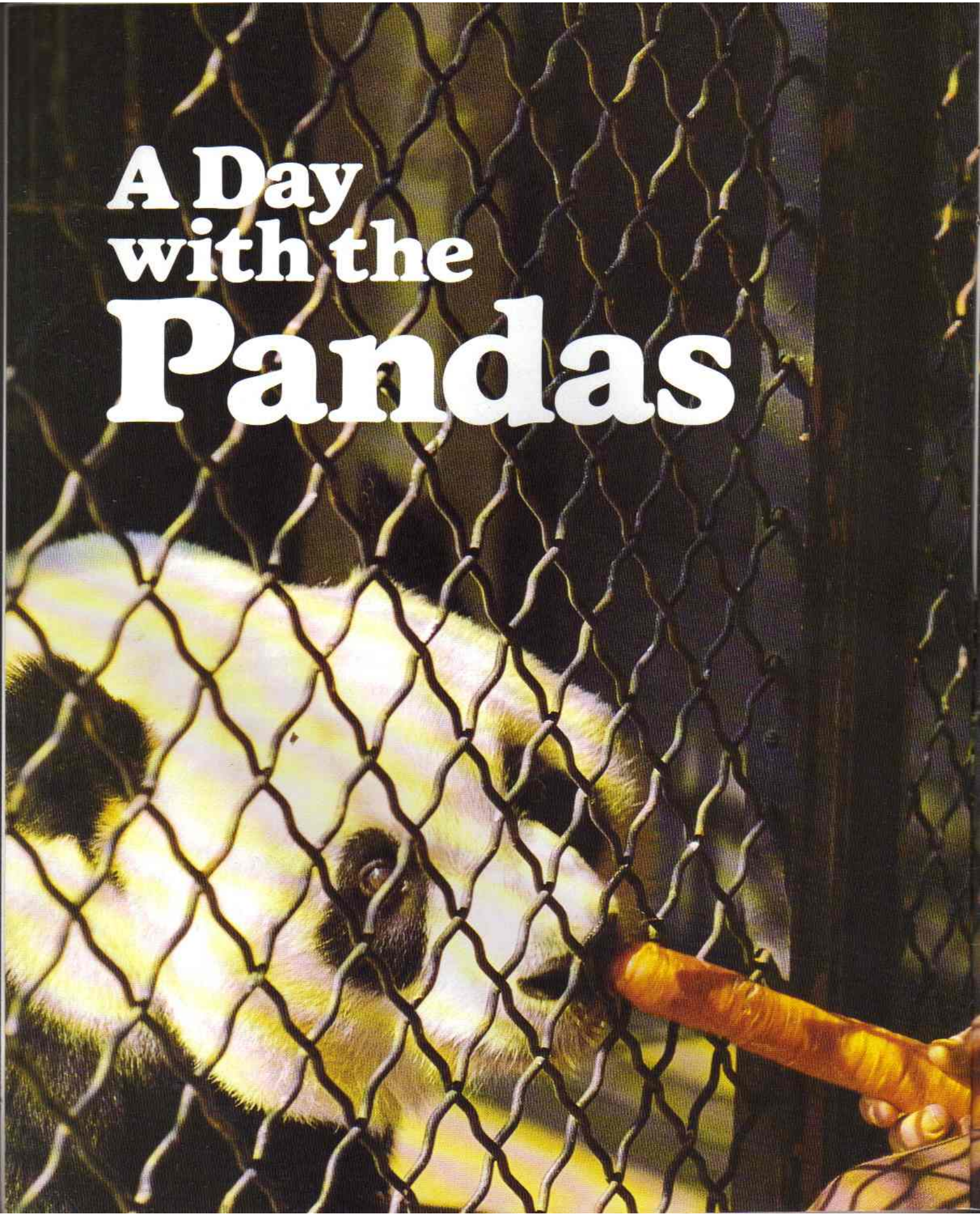
JUNE 1988
Volume 22 Number 6

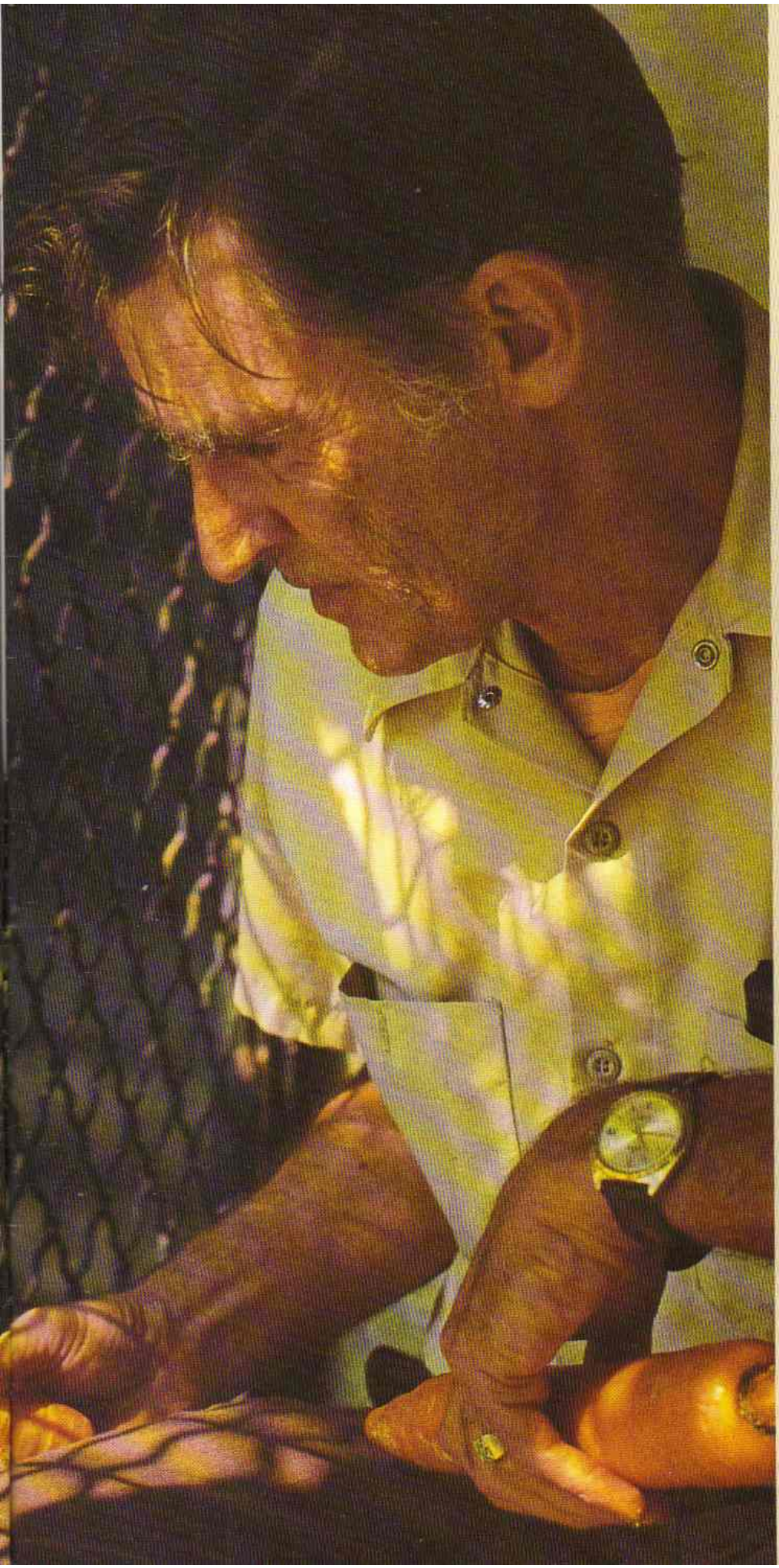
4 A Day With the Pandas
10 Handy Panda
12 Happy Bee
14 Beaver Bother
17 Critter Crackups
18 Bad News Beetles
20 Adventures of Ranger Rick
24 Volcano!
32 What a Way to Go!
36 Bullfrog Poem
37 The Emus and Me
40 Who-o-o Knows?
41 Snert Goes Snooping
47 Dear Ranger Rick



The Covers: Front and Back—Dwight R. Kuhn; **Page 3**—John Cancalosi

Listen here . . . I'm no ostrich, and I'm not Big Bird. And don't you dare call me a punk rocker! Find out what I *really* am on page 37.


A Day
with the
Pandas



At the National Zoo in Washington, D.C., zookeeper Mike Connery feeds a panda named Ling-Ling. It's just one part of taking care of his two very special friends.

Story by Bet Hennefrund
Photos by Jessie Cohen, National Zoo

5 A.M. *Zzzzzzzzz!* Hsing-Hsing and Ling-Ling—two giant pandas—are snoozing away in their two separate indoor pens.

Neither panda sees Mike, one of their keepers, come into the Panda House. He quietly stops by each of the big windows and checks on the animals.

7 A.M. Hsing-Hsing is now wide awake and on the prowl. He clambers around on the small "mountain" in his pen, stopping now and then to drink from a stream trickling into a pool. Then he begins to pace restlessly along the pen's walls.

Next door, Ling-Ling is curled up in her bowl-shaped "sandbox," still asleep. She looks like a huge, furry, black-and-white beach ball.

Mike lets Hsing-Hsing into the big, grassy yard outside

his pen. Then he wakes Ling-Ling by splashing the floor of her pen with a hose. Ling-Ling uncurls, stretches, and slowly ambles out into her own yard.

A high wall separates the two yards. The pandas can see each other through a big, round gate. But they usually spend their days as well as their nights in their own private spaces. They don't mind. Pandas in the wild also live alone, in the high craggy mountains of China. They meet only to mate, and then the male goes his way. The female alone raises the baby (usually only one).

8 A.M. For an hour the two pandas have been wandering around their yards. Like all pandas, they walk pigeon-toed on their short, stumpy legs. Their backs and rear ends sway in a comical way. Hsing-Hsing and Ling-Ling look almost like twins, except that he's bigger and heavier. Each panda is built like a powerful small tank—a great shape for tunneling through thickets of bamboo in the wild.

8:30 A.M. Ling-Ling climbs up to her favorite platform under a willow tree. The platform is set on a heavy spring about 8 feet (2.5 m) off the ground. It sways under her weight as she sits there on her round rump.

Ling-Ling and Hsing-Hsing each have their own "jungle gym," which takes up much of each yard. Hsing-Hsing "works out" often: climbing steps, playing on a swinging tire, doing somersaults, and pacing his platforms. Ling-Ling's gym has swinging bridges and balance beams as well as her springy platform. But now she's content to sit in one spot and rock back and forth.

9 A.M. Hsing-Hsing comes over to the wire fence and lets Mike, the keeper, scratch him on the back. When the pandas first came to the zoo in 1972, Ling-Ling was the friendly and outgoing one, and Hsing-Hsing was shy. Now things have switched. Hsing-Hsing is the outgoing one.

But nobody dares to go into either panda's yard or pen when the pandas are there—especially since Ling-Ling roughed up another keeper a few years ago. Pandas can move very fast, and their teeth and claws are strong weapons. Like tigers and lions and other big furry animals, pandas aren't as cuddly as they look!

10:45 A.M. It's getting close to feeding time and many visitors line the rails along the panda yards. They point, laugh, and take pictures, but the pandas don't seem to notice the crowds.

The pandas now wander back into their indoor pens, and Mike closes the doors. Then he sets up a small "forest" of bamboo stalks on each of their platforms outside. Finally he brings out the rest of their meal.

The pandas are fed every day at 11 A.M. and at 3 P.M. Besides 30 pounds (14 kg) of bamboo at each meal, they get a big pan of rice. Vitamins, minerals, dry cottage cheese, and honey are mixed into the rice. Hsing-Hsing gets a few apples and carrots. Ling-Ling gets no carrots but almost twice as many apples and a raw sweet potato.

11 A.M. Their meal is ready. And when Mike opens the doors of their pens the two pandas dash for their bamboo. Each sits like a boulder and attacks the small forest Mike has set up. They hold the stalks in their paws and strip leaves off with their teeth. When several leaves are in their mouth, they remove them with a paw and munch them like Popsicles. Pandas' teeth are broad and flat, good for breaking and grinding. Their paws have sharp, bearlike claws and a special wristbone that sticks out to the side. This bone works like a thumb for holding things.

2 P.M. Three hours after he began eating, Hsing-Hsing has polished off his whole meal. Ling-Ling has left some bamboo and most of her rice, which sparrows are eagerly gobbling up. She carries an apple around in her mouth and then drops it as she paces her yard.

2:30 P.M. The pandas again wander back into their pens. And now it's time for Mike to tackle the clean-up job in their yards. Bits and pieces of bamboo are scattered all over the ground under the platforms. (Ling-Ling is messier than Hsing-Hsing.) Mike also scoops up the animals' droppings. As in the wild, pandas digest only a small fraction of what they eat. So together they leave 15 to 17 pounds (7 to 8 kg) of droppings each day!

Mike carries a bunch of bamboo into the pandas' yards (left). That's their main kind of food. But carrots, sweet potatoes, and apples (above) make great treats.

3 P.M. It seems that Hsing-Hsing and Ling-Ling have just finished one meal when it's already time for another—this time inside their pens. (Pandas in the wild also spend more than half of the day eating.) Visitors watch through the windows of the Panda House. Cameras flash and click, but the pandas ignore everything and eat and eat and eat some more.

4:30 P.M. Hsing-Hsing and Ling-Ling are still munching away when the doors to the Panda House are closed to visitors.

Soon Mike will also leave and the pandas will keep on eating. They'll bed down when they're chock-full, maybe at 6:30 or 7:00. To sleep, Hsing-Hsing almost always sprawls on the floor. Ling-Ling usually curls up in her sandbox. In the wild, pandas lie down almost anywhere to sleep. Their thick, springy fur protects them from cold and wetness.

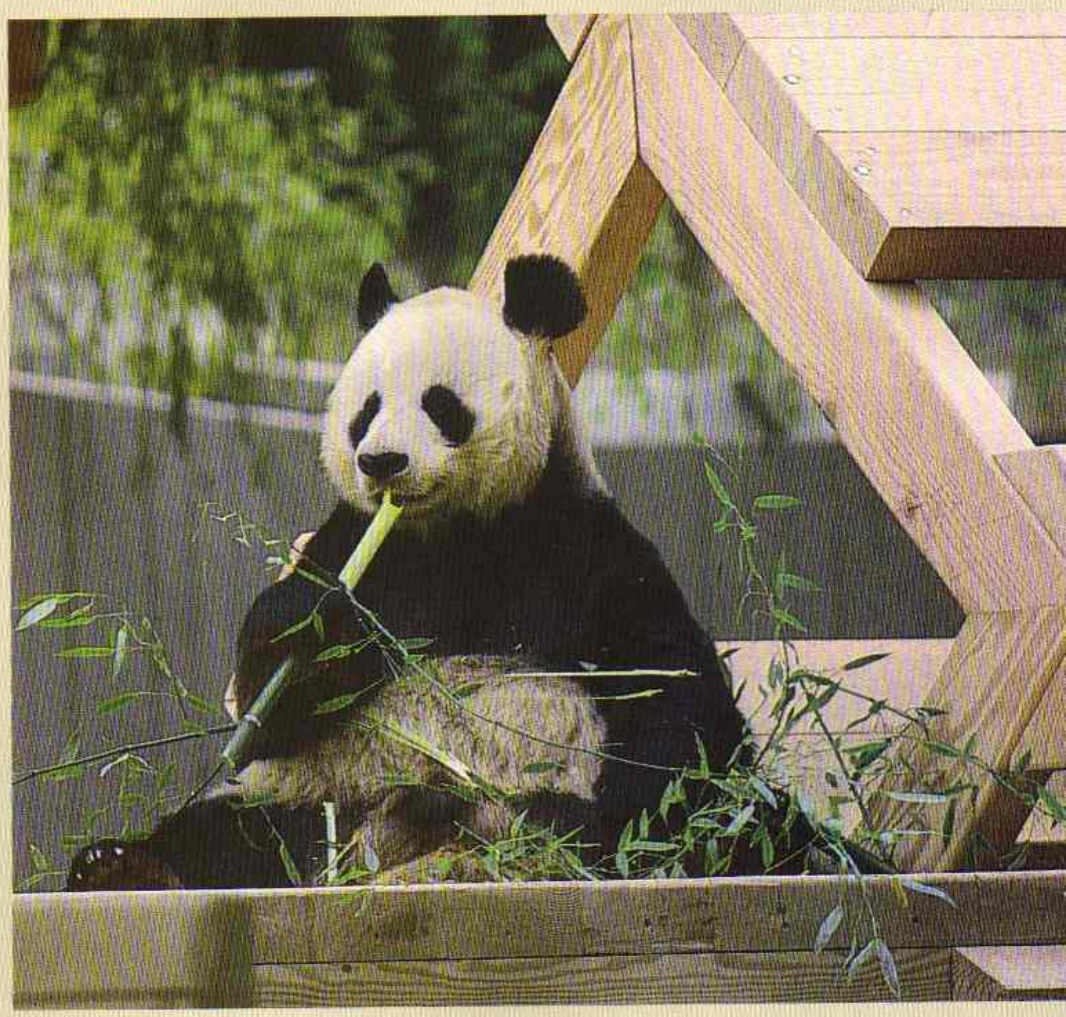
During the night the zoo police may check on Hsing-Hsing and Ling-Ling once or twice. Then, at 5:00 in the morning, Mike or one of the other keepers will return. Another day of zoo life for the pandas will begin.

MORE ABOUT PANDAS

• Giant pandas are an endangered species. There are only about 700 to 1000 pandas left in the wild, and all live in the rugged mountains of central China. (That's where Hsing-Hsing and Ling-Ling came from.) Only 66 pandas live in zoos throughout the world.

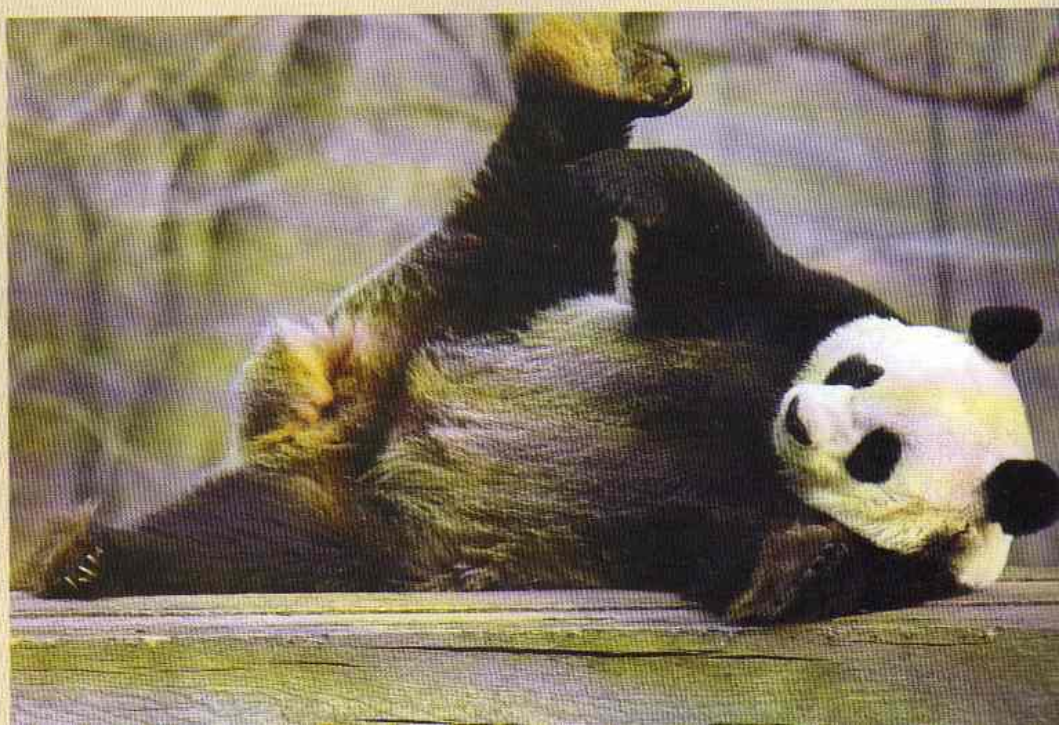
Each spring at the National Zoo, Hsing-Hsing and Ling-

Hsing-Hsing romps on his "jungle gym" (left), then takes time out for a bamboo snack (below). In her yard next door, Ling-Ling (bottom) has her own panda fun.



Ling are put into the same pen once every day. The hope is that they will mate and have a baby. So far, Ling-Ling has given birth to three babies, but all have died.

The pandas mated again this spring. But at the time this story went to the printer, no one knew whether Ling-Ling would have a baby. If she does, you'll soon be hearing or reading the news.



Handy Panda

by Gayle Stewart

You can easily make a handy panda puppet. All you need are a black glove, an old white sock, a 4 × 4″ (10 × 10 cm) piece of thin white cardboard, a sheet of heavy black paper, a black felt pen, glue, and scissors.

Here's what you do:

- Cut a hole in each side of the sock near the toe end (see drawing). When the puppet is on your hand, your thumb fits through one hole and your little finger through the other.
- Using our drawing as a guide, make the panda's legs, head, and features from the cardboard and paper.
- Put a dab of glue in the center of the back of the panda's head. Then stick the head on the toe of the sock.
- Glue on the legs.
- With the pen, color the space on the sock between the panda's face and the holes.
- Put on the glove and pull the sock over it. Slide your thumb and little finger through the holes in the sock.
- Now move your fingers and thumb around to make your puppet nod, wave, and clap!

Adapted from *Ranger Rick's NatureScope.*

Drawing by Jeanne Turner

8 Reasons to Join Ranger Rick's Nature Club

for girls & boys 6-12

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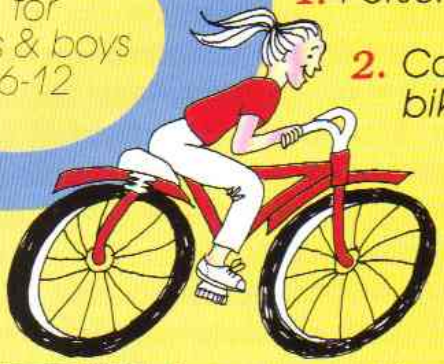

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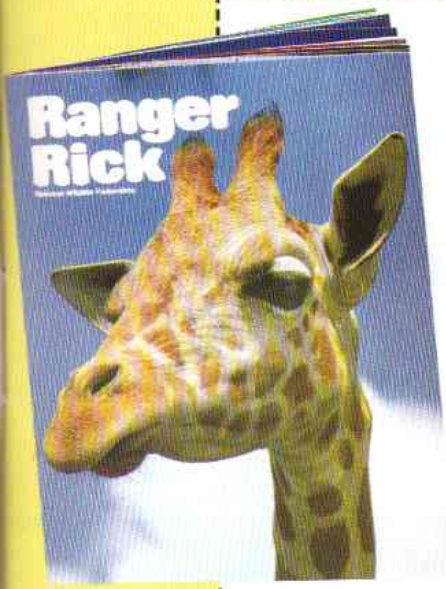

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Happy bee

Hi there! I'm Happy Bee, and have I got some good nature news for you!

I just got back from my vacation. I buzzed to places far, places near, and places in between. And everywhere I went, I learned about people going out of their way to help wildlife! I wrote everything down in my travel diary. Then I made a beeline home to let you read about it. . . .

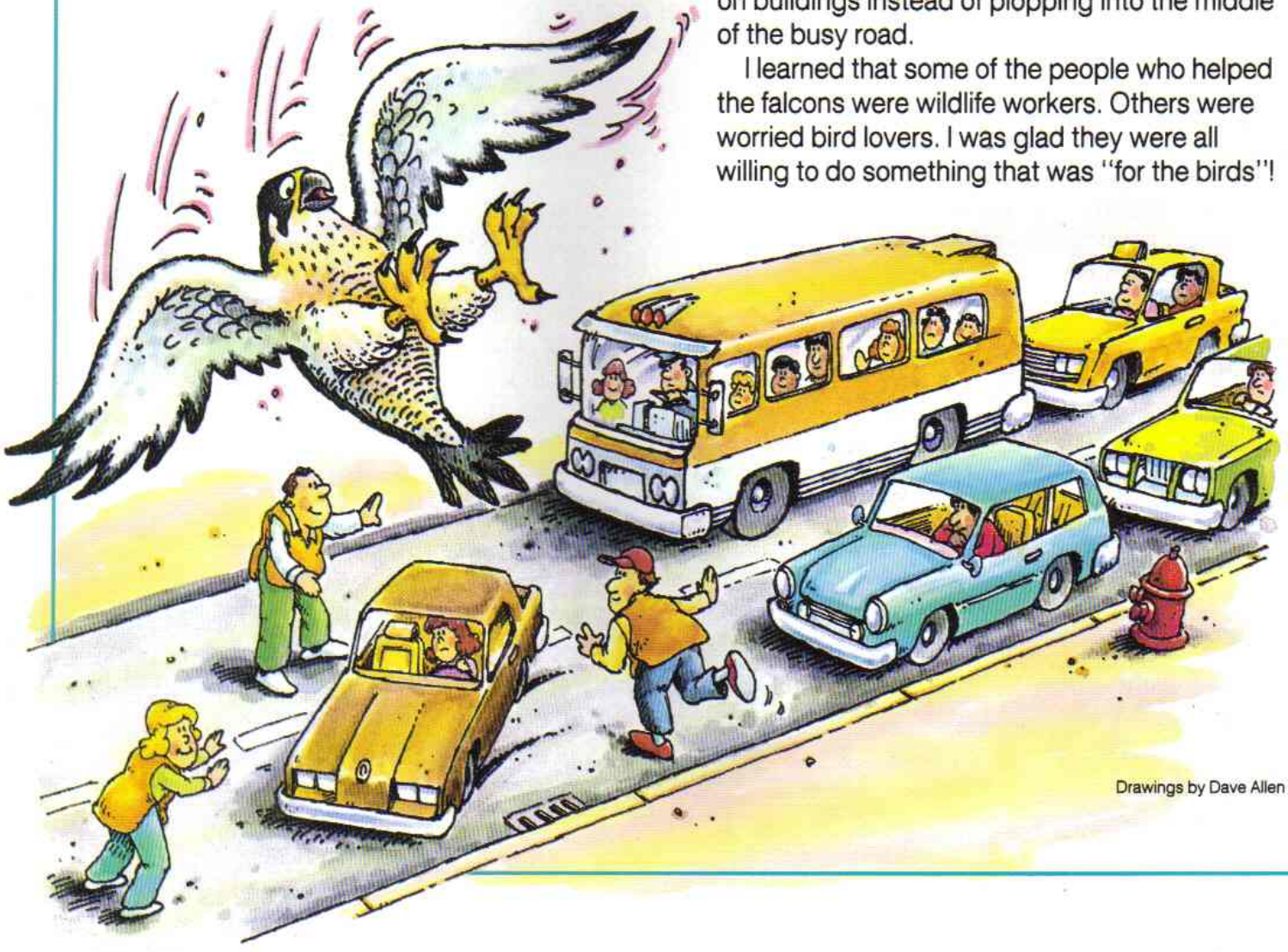
Salt Lake City, Utah—Today I was flying through the city when I saw a surprising sight. A pair of peregrine (PAIR-uh-grin) falcons had built their nest on a high ledge of a hotel!

As I watched, I saw that one of their young was learning to fly. It took off and began to fall straight toward the traffic-filled street. *Uh-oh, that bird's a goner for sure,* I thought.

But as the bird was about to land, a group of people in orange safety vests dashed out into the road. Horns screamed and tires screeched as the people blocked the cars' way. Then one of the people picked up the young falcon and carried it to the sidewalk.

I watched for a couple of days and saw this happen a few more times. Each time, the baby birds were carried safely back to the nest. But as the birds flew more, they became better at it. Soon they learned how to land safely in trees or on buildings instead of plopping into the middle of the busy road.

I learned that some of the people who helped the falcons were wildlife workers. Others were worried bird lovers. I was glad they were all willing to do something that was "for the birds"!



Drawings by Dave Allen

Fripp Island, South Carolina—I decided to spend this morning buzzing along the beach. After a while, I came across some people digging in the sand. I wondered whether they might be digging up buried treasure. But when I went down for a closer look, I saw that they were really digging up *eggs!*

At first I was confused. But after I listened to the people talk a while, I understood what was going on. The eggs had been laid by a *loggerhead sea turtle*. These endangered animals come ashore once a year to lay their eggs. Each female turtle digs a sandy hole with her flippers. She lays about 200 eggs in the hole and covers them with sand. Then she returns to the ocean.

But very often, the eggs aren't safe where the turtles leave them. People walking along the beach may disturb the eggs or accidentally step on the nest. And predators such as raccoons may find them and eat them.

That's why the people I saw were moving the eggs. They are part of a volunteer "beach patrol." Each morning during the turtles' nesting season, these people search for turtle tracks leading to nests. When they find a nest, they dig up the eggs and rebury them on top of some nearby sand dunes. The dune area is protected by a wire fence that keeps other people and hungry enemies out.

The volunteers keep watch over the eggs until they hatch. Then they carry the baby turtles to the ocean and let them go. I'll bet they look forward to being "turtle-sitters" again next year! (For more on turtles, see page 20.)

Buckinghamshire, England—Flying over the English countryside one moonlit evening, I saw a strange sight. Under a nearby road was a tiny tunnel. And hopping out of it was a toad!

I was pretty curious, so I did some checking. I found out that this village had been having "toad crossing" problems. Each year, hundreds of toads were squashed as they crossed the busy road. They needed to cross the road to get to their breeding ponds on the other side. So building the toad tunnel was a great solution. Now low fences guide the toads into the safe tunnel and away from the dangerous road.

I guess when you can't fly over a road the way I can, going under it is the next best thing!

Ellsworth, Maine—Flying over an airport today, I thought my eyes were playing tricks on me. I saw two birds being put into a plane.

Birds taking a plane is about as strange as bees buying honey, I said to myself. So I flew down to see what was going on.

I learned that the birds were young ospreys that had been found alone and unable to fly. One had somehow landed in polluted water, and its feathers were coated with sticky, grimy oil. The other's feathers were in poor condition. So every time it got wet it got too soaked to fly.

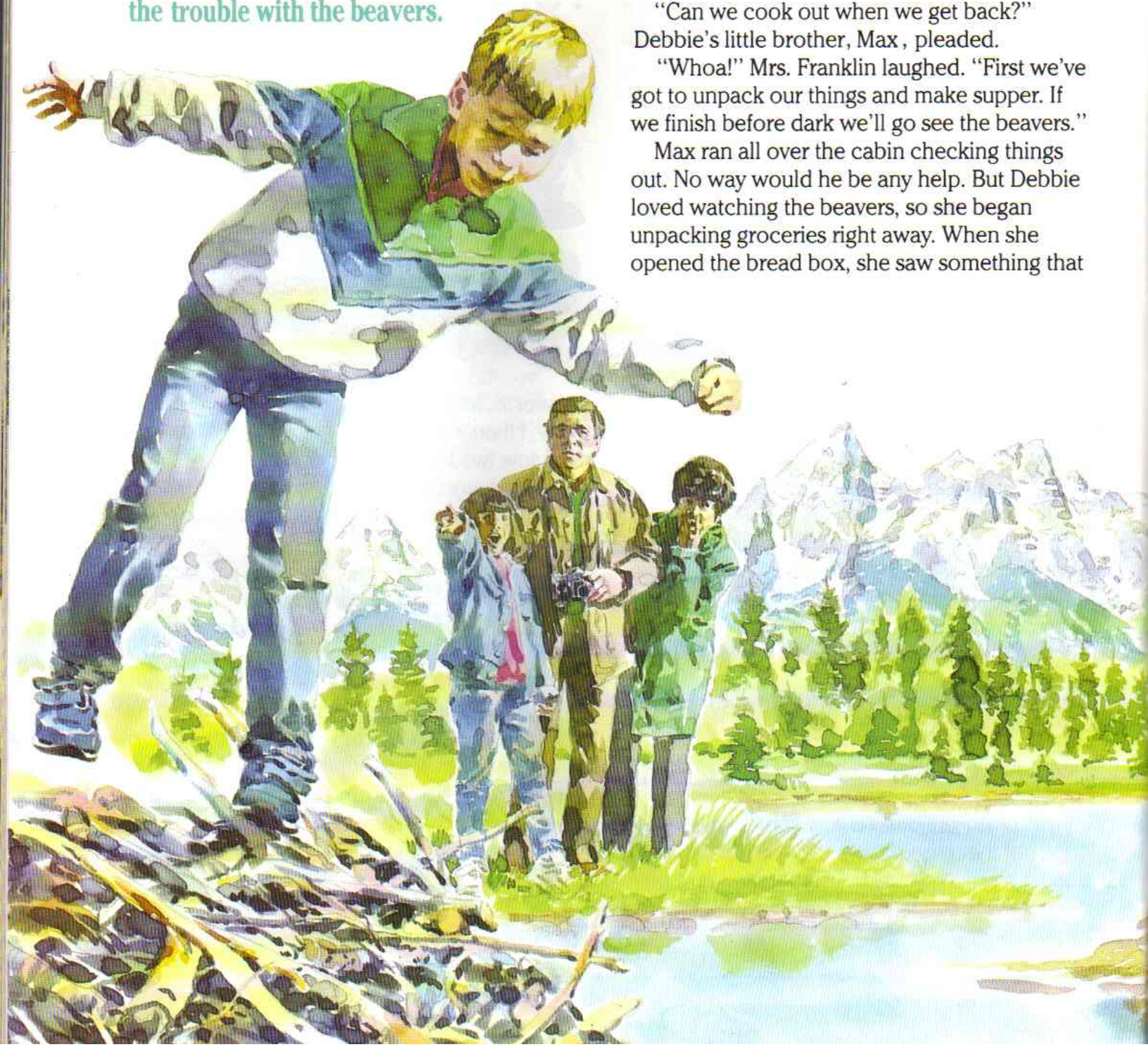
The young birds needed to get to a special rescue center in Florida that works with ospreys. There they could be taken care of until they were able to survive on their own.

So the nice people who run the airline offered to give the ospreys a free ride. And the birds flew south without ever flapping a feather!

BEAVER BOTHER

A story by Leslie Dendy

Whap! The beaver's tail slapped the water. Max was so startled he slipped and fell into the pond. But that wasn't the end of the trouble with the beavers.



The blue Jeep bounced up to the back door of the Franklins' old mountain cabin.

"We're here!" yelled Debbie. "Can we go to the ghost town tomorrow morning?"

"Can we cook out when we get back?" Debbie's little brother, Max, pleaded.

"Whoa!" Mrs. Franklin laughed. "First we've got to unpack our things and make supper. If we finish before dark we'll go see the beavers."

Max ran all over the cabin checking things out. No way would he be any help. But Debbie loved watching the beavers, so she began unpacking groceries right away. When she opened the bread box, she saw something that

looked like dry black rice. "We've had mouse visitors," she announced. Then she found a sponge to wipe the mouse droppings out of the box. But when she turned on the tap at the kitchen sink, no water came out.

"Dad has to connect the pipe to the beaver pond, Debbie," said Mrs. Franklin.

"Oh, yeah," Debbie mumbled. "I forgot."

Beavers had dammed up a stream and made a pond near the cabin. And Debbie's dad had laid water pipes from the cabin to the beaver pond. He disconnected the pipes every fall, so water wouldn't freeze in them and crack them. Then every summer he hooked the pipes together again.

"Hurry, Dad!" said Debbie. "We need water to cook our spaghetti!"

"Just give me half an hour," said Mr. Franklin, waving his wrench.

Mrs. Franklin began making a salad, and Debbie started a fire in their wood-burning stove. By the time the stove was hot enough for cooking, the water was running.

"I want a drink," Max said when he heard the water rushing from the faucet.

"First we have to boil it to kill the germs," his mother said. "You can have a drink later."

Supper tasted twice as good as it ever did in the city. When they finished eating, the family put on jackets and hiked to the pond.

"There!" Debbie pointed at a beaver in the water. It swam in slow circles near a screen "cage" at the edge of the pond.

"Dad," Debbie asked, "is the end of our water pipe in that cage?"

"Yep. Whenever I hook up the water pipes and our water starts to drain out, the beavers feel a little 'leak' in their pond. Sometimes they try to stop the leak by plugging the open end of the pipe with sticks and mud. So I built a screen cage around it."

Suddenly Mrs. Franklin turned and yelled loudly, "Max! Stop!"

Max was quietly sneaking out onto the dam.

"But I can't see the beaver," he whined.

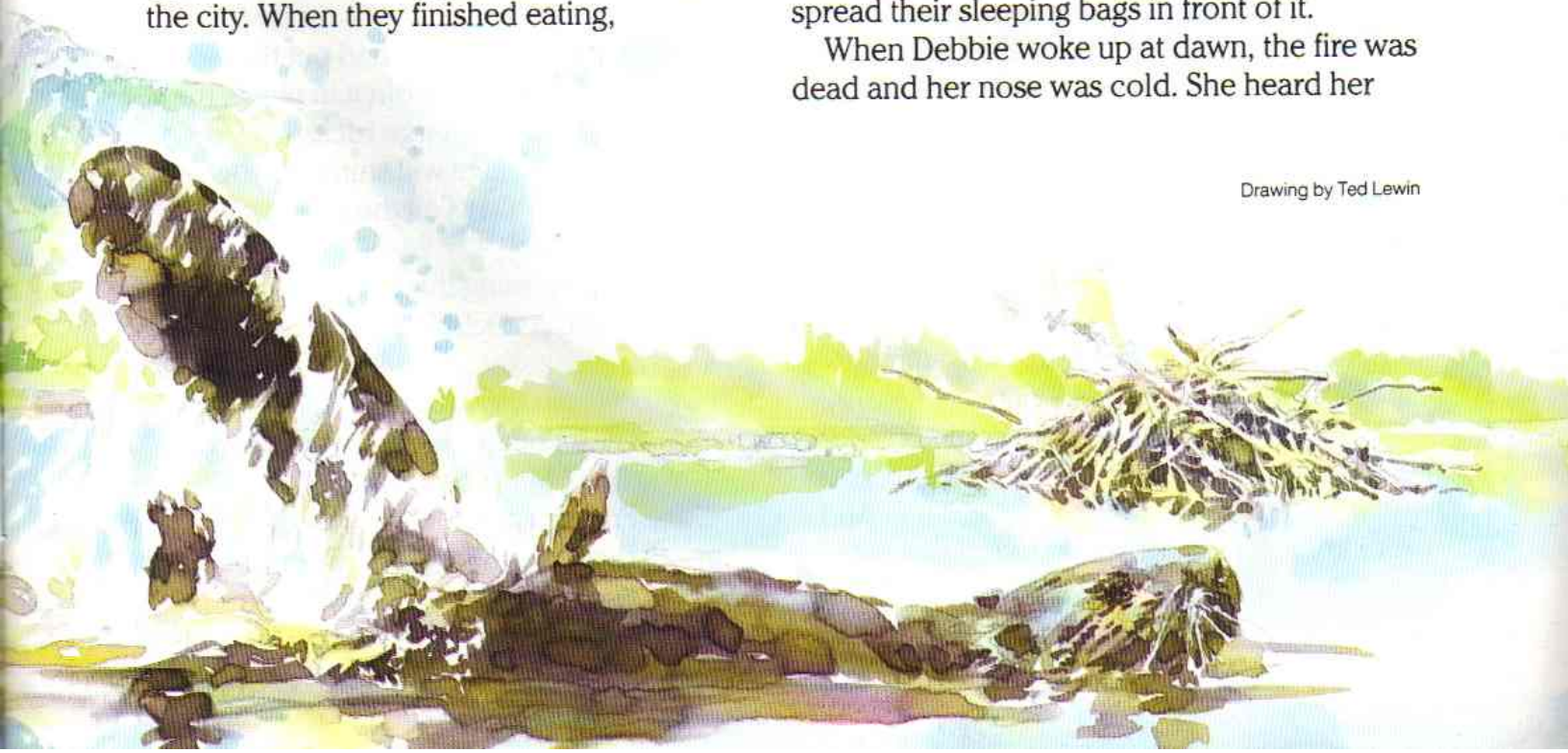
The beaver swam straight toward the dam. Then it turned and slapped its flat tail on the water. *Whap!* The loud sound warned the other beavers that danger was near.

Max jumped, slipped on the wet dam, and splashed into the pond up to his armpits. The beaver disappeared.

"Great move!" complained Debbie as Max sloshed out of the pond. "None of the beavers will come back out tonight."

The family trudged back to the cabin. Debbie started a fire in the fireplace. Then she and Max spread their sleeping bags in front of it.

When Debbie woke up at dawn, the fire was dead and her nose was cold. She heard her



Drawing by Ted Lewin

mom and dad rattling pans in the kitchen. Visions of pancakes started warming Debbie up—until her mom said, "Blast it! There's no water!"

"The beavers probably knocked off the screen and plugged the pipe," Mr. Franklin mumbled sleepily. "I'll fix it after I've had a nice hot cup of coffee."

Mrs. Franklin smiled. "No water—no coffee."

Debbie's dad looked as if he'd swallowed a toad. He pulled his rubber wading boots over his pajamas and put on a coat. Grabbing a shovel and a couple of other tools from a closet, he stomped out of the cabin.

An hour later muddy brown water shot out of the faucet. A few minutes later, the water cleared up. Fifteen minutes after that Mr. Franklin returned—cold, muddy, and hungry.

After breakfast, Mr. Franklin declared, "It's too late to start a big hike or Jeep trip now. Let's make this a chore day."

The whole family was busy the rest of the day. Mr. Franklin cut down dead trees and sawed them into logs. Debbie and her mother used axes to split the shorter logs into skinny pieces for the stove. Max collected a few fire-starting twigs.

Debbie went to bed exhausted. *Tomorrow has got to be better!* she thought.

But the next morning there was no water.

"Why are the beavers being such a bother this year? They pushed the screen off again," complained Mr. Franklin. He had just come back from unstopping the pipe.

"We've got to think of something," Mrs. Franklin began, "or ——"

"Or our whole vacation will be ruined!" Debbie said, finishing her mom's sentence. She thought about the fun she'd had last summer—especially when she'd built a raft.

"Hey!" Debbie exclaimed. "I could build a better cover for the water pipe! The beavers wouldn't knock over a heavy wood cage. And we've got lots of wood in our woodpile!"

"It might work," Mr. Franklin said. "I don't think the beavers know enough to chew through the logs to get at the pipe. But it sounds like a big job."

"I built a raft by myself last year, Dad," Debbie said. "But I could use some help."

Mr. Franklin chuckled. "OK. It's certainly worth a try."

First Debbie and her dad made a large box-shaped frame out of some thick boards he'd found in the shed. They built it right by the pond so they wouldn't have to carry it uphill. Debbie brought up a log, a long rope, and a pocketknife. She cut a piece of rope, placed a log upright outside the frame, and tied the log to it. It was almost like making a raft.

Max wanted to help. "I'm an eager beaver!" he said. But all he did was tangle the rope.

Debbie couldn't stand it. She had to get rid of him. She said, "Beaver Max! You need to drag fifteen more logs up here to your pond."

It worked. Max eagerly dragged logs up the hill. But even with Max out of the way, the job took an hour. Every log had to be tied tightly to the frame. The spaces between the logs had to be wide enough so that the beavers couldn't easily plug them with mud. But they couldn't be so far apart that a beaver could get inside and stop up the pipe.

Finally Debbie and her dad put the wood cage over the pipe. To hold it in place, they covered the top with large rocks.

"I'm *sure* this cage will stump the beavers for two weeks, and that's all the time we need," Mr. Franklin said.

The next morning there was plenty of water for breakfast. As Debbie was finishing her last pancake, she asked, "Could we *please* go to the ghost town this morning?"

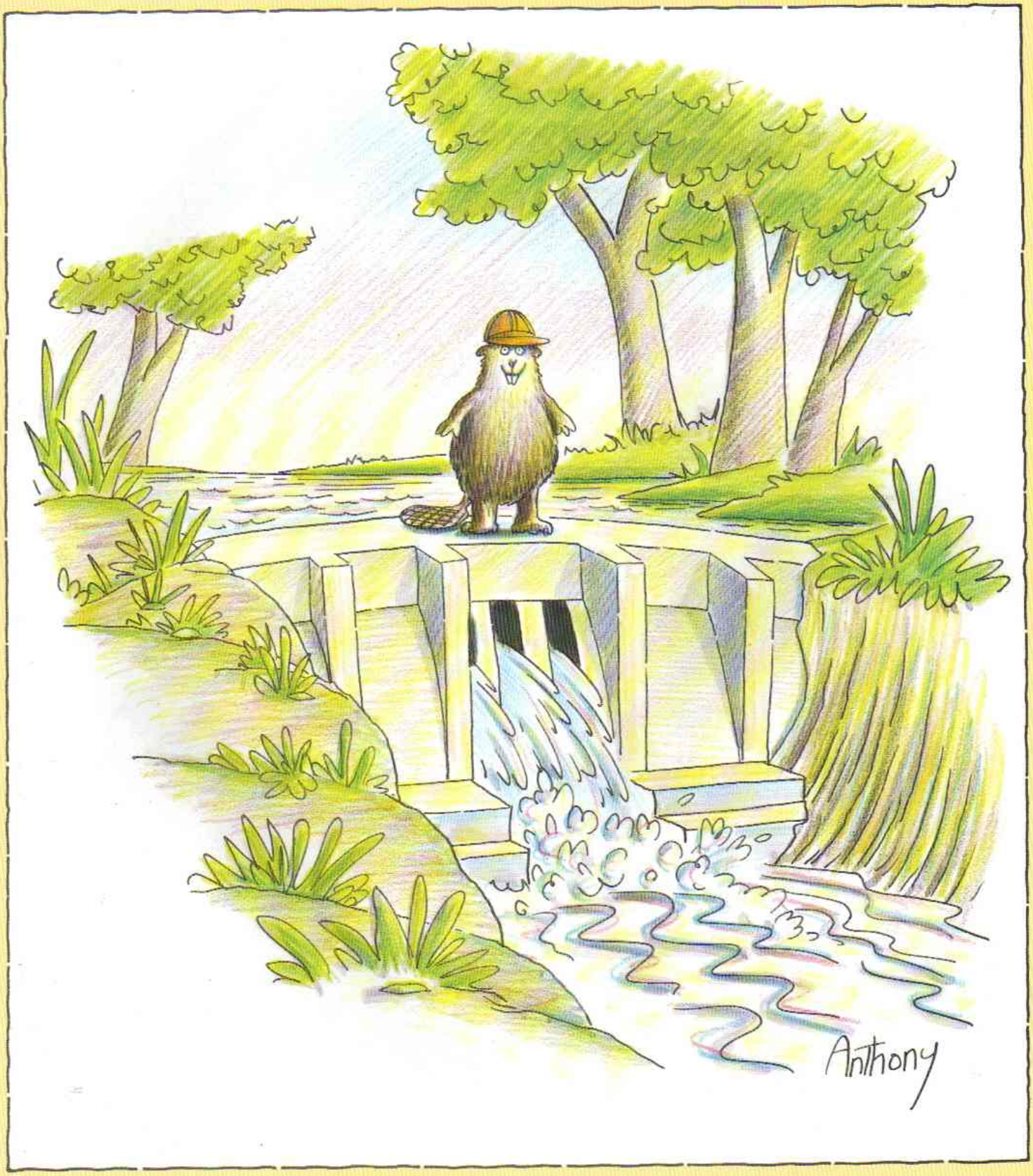
"And cook out tonight?" Max begged.

"You bet," Mr. Franklin answered.

Mrs. Franklin added, "We'll be busy as beavers all day long."

by Anthony Taber

Critter Crackups



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BAD NEWS BEETLES

Most blister beetles have poisonous blood that can stun or even kill their enemies. And some of these beetles may live right in your neighborhood!

• Over 2000 species, or kinds, of blister beetles live in fields, forests, deserts, and wetlands throughout the world. About 300 of these species live in North America.

• Some of these beetles are wildly colored (**see photos at left and right**). They may have stripes and splashes of orange, yellow, red, purple, or green. Others are coal black.

• Blister beetles use a special

trick called *reflex bleeding* to defend themselves (**below right**). When they get hurt or upset, they release tiny droplets of poisonous blood from joints in their legs. If the blood touches your skin, it can cause blisters or welts to form. (That's why these insects are named *blister* beetles.) And if this poisonous blood gets smeared on ants, spiders, or other small creatures, it can paralyze or kill them.

• In the 1800s, some people used the blood from blister beetles to try to cure many different diseases. These people thought the blisters that formed on the skin helped "cleanse" the body of disease.

• Desert blister beetles (**below left**) have a special way to beat the heat and dryness. Their shiny green, ball-like bodies have a small pocket of air inside. Some scientists think this air may help keep them cool and moist.

• Female blister beetles usually lay hundreds of eggs—sometimes as many as two thousand in one clump.

• When blister beetle eggs hatch, the larvae are tiny—some even smaller than the head of a pin. And they look almost like a cross between a miniature spider and a hairy bee, with a bristly body and spindly legs.

• As larvae, many blister beetles crawl along the ground searching for clumps of grasshopper eggs to eat. By eating so many grasshopper eggs, these blister beetle larvae help control the number of pesky hoppers that hatch.

• A few types of blister beetle larvae feed on bee eggs, nectar, and pollen. To find their food, these larvae climb into flowers and wait. If a bee lands on a blossom to feed, the larvae crawl up the bee's legs and attach themselves to its hairs or bristles. As the bee flies off, the larvae get a free ride to the bee's nest.

But many of these hitchhiking larvae end up climbing aboard the wrong type of insect, such as a fly or even their own parents. Since they never make it to a bee's nest, they starve or become a meal for another hungry creature.

—Judy Braus

Photos by Anthony Bannister/NHPA; Robert & Linda Mitchell; Scott Camazine; Joe DiStefano/Photo Researchers

Story by Rhonda Lucas Donald
Drawings by Alton Langford

Vero Beach, Florida, looked calm in the cooling twilight. But twelve inches under the sand hundreds of tiny flippers were busily *scritch, scritch . . . scritching.* A nestful of baby loggerhead sea turtles had just hatched, and they were scratching and scraping their way to the surface.

"All right, troops," said a muffled voice from under the sand. "Dig!" It was Sherman, the first hatchling out of its shell. "Come on, LT's [short for loggerhead turtles]. Let's get ourselves out of this hole!"

"Dig . . . dig . . . dig," they all chanted.

Scritch, scritch . . . they all worked.

Sherman shoved a flipperful of sand from in front of his beak.

"Light! I see the light!" He stabbed a foreflipper in the air. "This way, troops. Follow the light, LT's!"

"Follow the light . . . follow the light," they repeated.

Like an army of tiny tanks, the baby turtles filed out of their nest and marched toward the bright light ahead of them. They were doing what baby sea turtles are supposed to do—head for the light reflected off the sea water. But what these little hatchlings didn't know was that the light they were following wasn't coming from the sea at all. It was coming from a bright light near an apartment building across a busy highway.

Meanwhile, farther down the beach were some of the gang from Deep Green Wood.

"Look at this sand dollar!" said Sammy Squirrel as he poked Boomer Badger in the arm.

"Hey, watch the poking!" warned Boomer. "You didn't fall asleep on the beach and get a sunburn like I did."

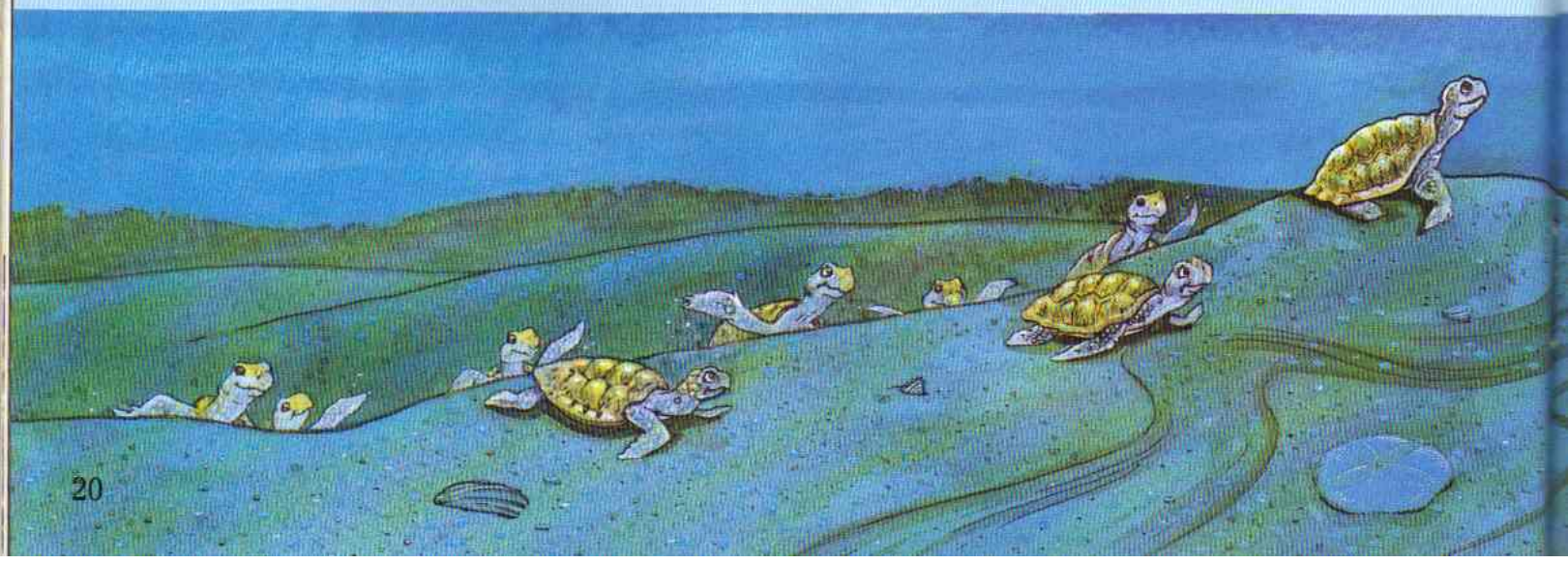
"Aw, come on, Boom, you only sunburned your nose!" teased the squirrel.

"Yeah, but it hurts all over," moaned the badger.

Scarlett Fox and Zelda Possum ambled up to the group, kicking sand ahead of them.

"I just loved watchin' those big ol' pelicans

Adventures of Ranger Rick



dive bombin' for fish in the water today," said Scarlett in her drawly Southern voice.

"Yeah, and we saw some armadillos too!" said the grinning possum.

"Hey, Rick," said Scarlett. "Where's all that light comin' from down the beach?"

"Maybe it's something fun—like a boardwalk with an ice cream shop," Zelda said, licking her lips and dreaming of double scoops.

"Let's go find out," said Rick.

"I bet ice cream's good for a sunburn," said the badger. "Especially chocolate."

"Gosh, that thing is bright," remarked Zelda as the friends approached the light near the apartment building. "It seems almost like daytime out here. And no ice cream shop either."

"Yeah, but what are all those little wiggly things over there?" asked Sammy. He pointed to some dark blobs crawling across the beach.

"Wiggly things?" asked Boomer, nervously looking back over his shoulder. "*What* w-w-w-wiggly things?"

"Oh, hang on to your stripes, Boomer," said Scarlett. "They're only baby sea turtles. And it looks like they've just hatched."

"Wow, look at 'em go!" said Sammy.

"But wait," said Rick. "They're not heading for the water the way they should be. They're heading toward the road!"

The friends could hear one of the turtles in the group as it scrambled across the sand.

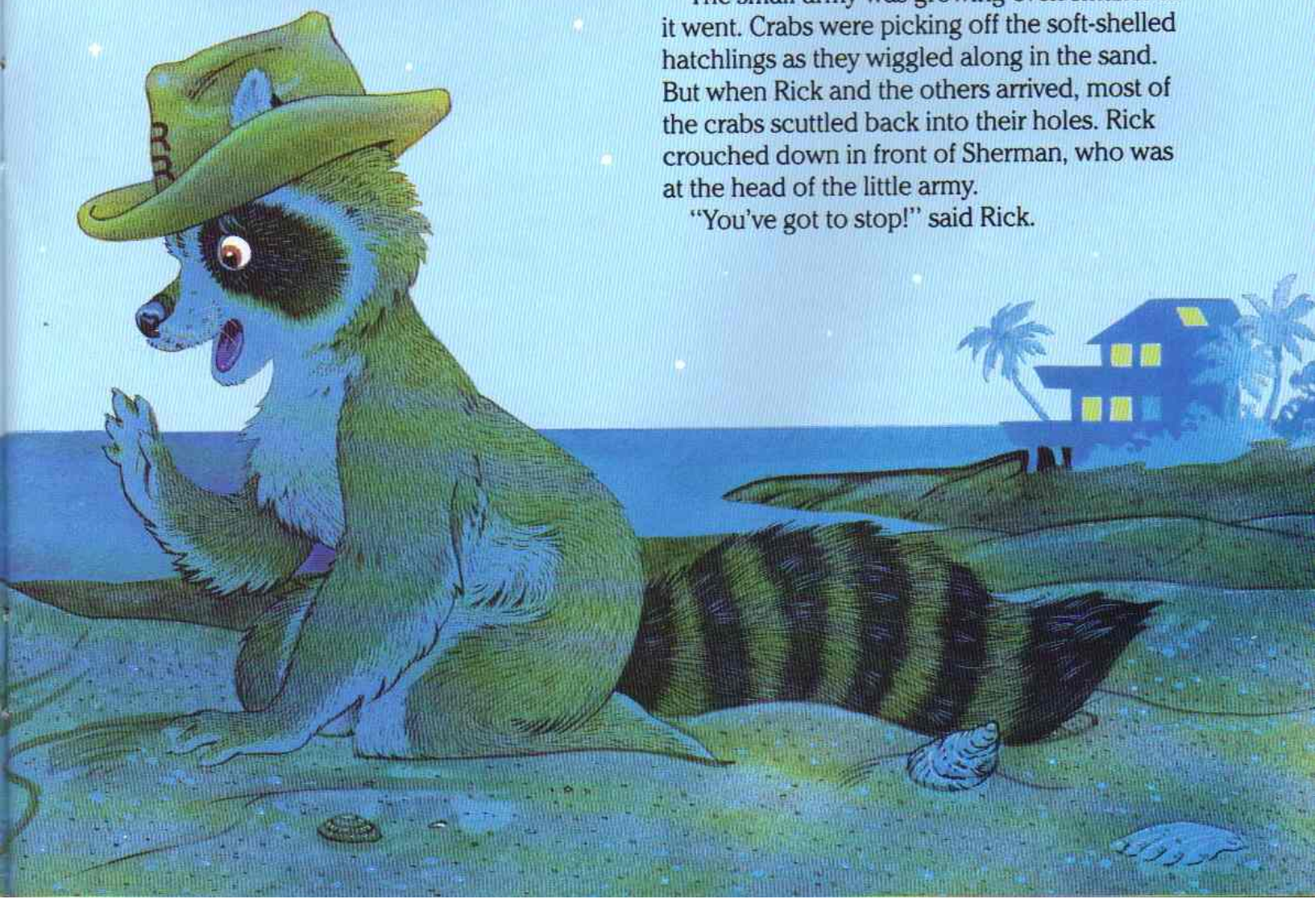
"Onward, LT's. Keep moving to the light!"

"Follow the light . . . follow the light," came the turtles' chants.

"They must think that floodlight is the light reflecting from the sea!" said Rick. "Hurry, everybody, we've got to stop them—they'll be to the road soon."

The small army was growing even smaller as it went. Crabs were picking off the soft-shelled hatchlings as they wiggled along in the sand. But when Rick and the others arrived, most of the crabs scuttled back into their holes. Rick crouched down in front of Sherman, who was at the head of the little army.

"You've got to stop!" said Rick.



"Companeeee, halt!" barked a frowning Sherman. "What's the meaning of this, Mister? Can't you see we're on a mission? We have to follow the light. No time for chitchat." The little turtle started to move out again.

"Wait!" said Rick. "You can't go this way. You'll march right onto a highway."

Sherman thought for a moment.

"That's a chance we'll have to take," he decided. "We have our duty."

"Yeah, duty calls," responded the rest.

"But you could all be killed!" interrupted Scarlett, who was standing nearby. "You're supposed to be headin' toward the sea. Look, there's light from the water too." Scarlett

pointed at the soft, silvery shimmer of the sea.

"Our duty is to follow the light, and by golly, that's what we're going to do. Sure, I can see some light back there. But that light over there—*that's* what I call a light to be followed."

"Yeah, what a light," the others agreed.

Sherman and the little turtles stared at the bright light glaring directly across from them. "For-ward, march!"

The turtles began their trek again, no matter what Rick had said.

"What can we do?" asked Sammy. "They'll never make it."

"Well, gang, I have an idea, but we've got to hurry," said Rick. "Scarlett, you and Boomer stay here and keep the crabs away. And be sure to let us know if the hatchlings reach the road." Rick whipped a towel out of his beach bag. "Sammy, you and Zelda come with me."

Rick, Zelda, and Sammy carefully crossed the highway and went to the light pole. The squirrel and possum shimmied up the pole, with Zelda carrying Rick's towel in her mouth.

"Rick! They're almost to the highway!" shouted Scarlett.

"OK," said Zelda. "Here goes Operation Lights Out!" She and Sammy snapped the towel down over the light, and the possum wrapped her tail around the loose ends. In a split second it was dark.

"Whoa! Halt!" yelled Sherman. All the little turtles bunched up behind him.

The very last turtle in the back of the group, and the tiniest turtle of them all, said, "Looks like there's been a change in plans, troops. A-bout face. For-ward march! Follow the *other* light." The tired little army turned around and began scritching toward the sea. Sherman now brought up the rear.

"Whew!" said Boomer. "That was close."

Rick came back from the highway to watch the little turtles going in the right direction.

"Well, thanks to Sammy and Zelda, these little critters are going to have a fighting chance," he said.

"They sure do have to face a lot of troubles just to get started in life," said Scarlett.

"And even if they make it in the beginning, they still face a lot of problems. That's why many kinds of sea turtles are endangered," said Rick sadly.

"But people are tryin' to help," added Scarlett. "Some places have passed laws to get rid of bright lights along beaches. And some people are teachin' others about sea turtles. They want to keep people from botherin' the mothers when they're layin' eggs and the babies when they're hatchin'."

Some of the little turtles were near the water now. And Sammy and Zelda had returned, leaving Rick's towel draped over the light.

"Looks like our mission was a success," said Zelda. Just then the friends heard a faint voice.

"Fall out, LT's—into the surf!" Sherman and the tiny troopers scrambled into the water.

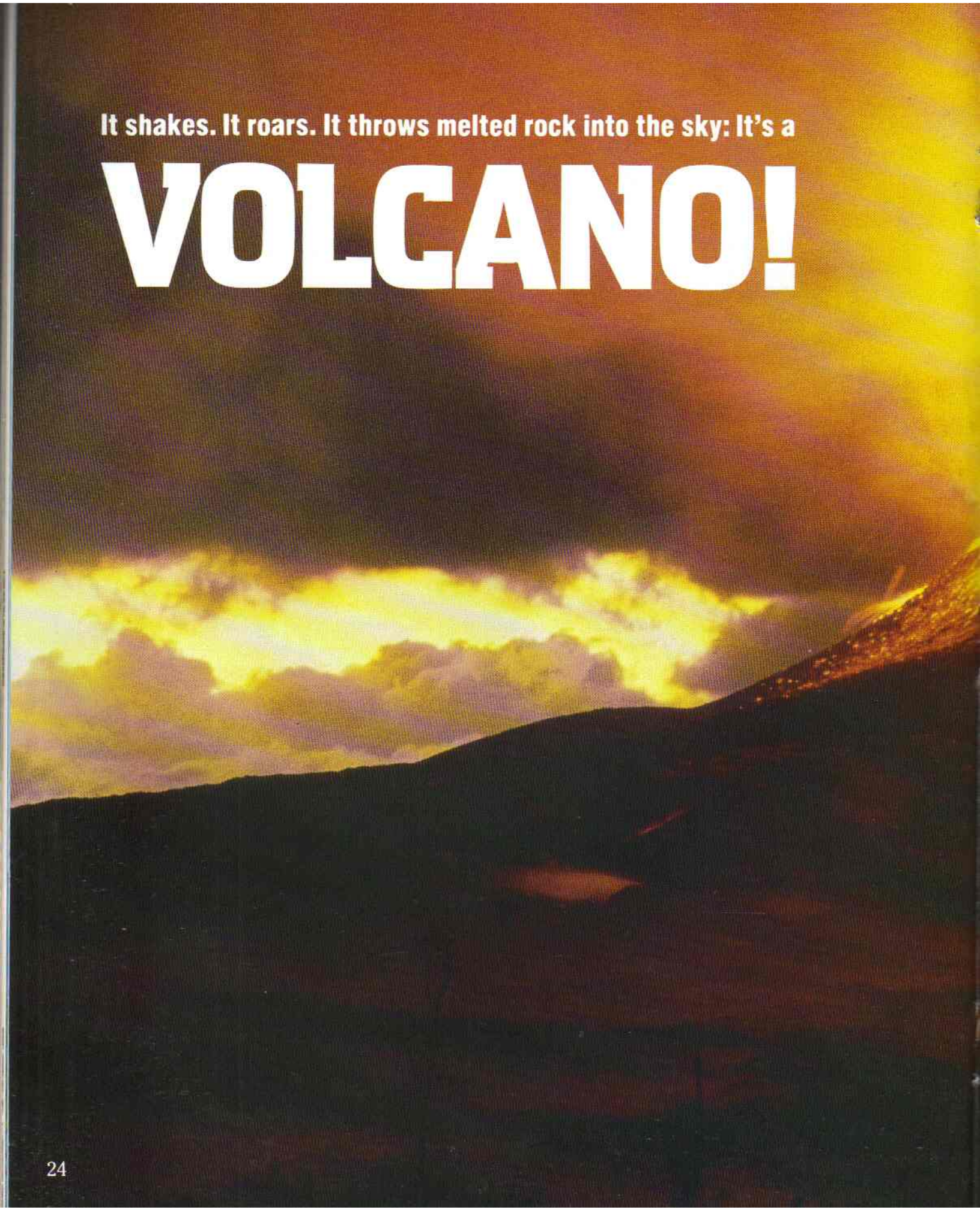
With a big squirrelly grin on his face, Sammy watched the turtles swim away.

"I guess *their* mission was a success too," he said, waving goodbye.

Rangers: Six of the world's seven kinds of sea turtles are so rare that they could become extinct. Many of the beaches where the mother turtles nest are lined with buildings. They also may be crowded and noisy. The bright lights and noise keep many turtles from laying their eggs. But even where turtles *do* lay eggs, their nests may be destroyed by beach cleaning machines or by the dumping of new sand. Also, litter on beaches attracts animals that may dig up turtle eggs and eat them. And as you've seen in this story, newly hatched turtles may be led astray by beach lights.

Even adult sea turtles face problems. Many are caught in shrimp nets and drown; many more are hunted for food. And sometimes turtles mistake plastic trash for food. If a turtle eats the plastic, it may die.

But there is some good news. Laws against beach lighting have helped the turtles in some areas. And people have been working hard to help them in other ways too. For more about turtles, see page 13. R.R.



It shakes. It roars. It throws melted rock into the sky: It's a

VOLCANO!

by Caroline Wakeman Evans

It's 5:00 A.M. and I'm already wide awake. I live on a volcano—and when my windows start to rattle, I *know* it's time to get up.

I'm a ranger in Hawaii Volcanoes National Park, on the big island of Hawaii. That's why I live *and* work on a volcano. My home is on top of the most active volcano in the world: Kilauea (KEEL-ow-WAY-uh).

Quickly I dress and go out on my porch. The clouds are glowing red. And I hear a deep roar like the noise of a jet engine. Kilauea's erupting again!

Lots of Lava

The roaring and shaking are all part of an *eruption*. When Kilauea erupts, super-hot melted rock called *lava* comes out of the volcano from deep inside the earth. (See drawing on page 28.) The lava may flow faster than a river. It also may shoot into the sky, a fiery fountain up to 10 times higher than the Statue of Liberty. And sometimes, like today, it does both. (See photo pages 24 and 25.) At other times the lava just oozes, slowly stretching its dark fingers over the land.

Lava can burn or bury everything in its path: trees, roads, even houses. But as it cools and hardens, lava becomes new land. In fact, the whole island of Hawaii is made of lava from Kilauea and four other volcanoes.

In the last 200 years, Kilauea has erupted over 60 times. But it's one of the safest active volcanoes in the world. Scientists can forecast where and when the lava is likely to flow. That's why people can live *on* the volcano, and visitors can come to watch eruptions!

Flying Over Kilauea

This morning I report to work dressed in heavy boots, fireproof clothes, and a flight helmet. My job is to take a helicopter ride over the eruption to see the action firsthand. Park visitors won't be able to see the eruption up close today, so I want to be able to describe to them what's going on.

The lava is shooting out of a *vent*, or opening, on the east side of the volcano. That's 10 miles (16 km) from the visitors' center, and no roads go near it. But people will be able to see the fiery fountain in the distance as they drive back down the mountain.

From the helicopter, I'll look for places people can see lava that flows down the mountain. If it's flowing slowly near a road, visitors can walk close to the lava and feel its heat.

As the pilot flies the helicopter near the fountain of lava, I get my first whiff of the rotten-egg smell of *sulfur dioxide*. This gas comes from inside the volcano. It makes my throat scratchy, and I start to cough. The ride gets rougher as the helicopter bounces around on the currents of hot air. Suddenly the helicopter is lifted up, then just as fast it drops down. My stomach somersaults and I'm a little scared. But soon we fly away. The air is now calmer and so am I.

Working on the Edge

I can see scientists working down below, near lava that's flowing away from the vent. One scientist is wearing thick leather gloves and holding a rock pick. She dashes up, dips

her pick into the taffylike lava, and drops a red-hot blob into a can of water. When the sample has cooled, she'll find out what chemicals are in it. The chemicals will help her tell how far inside the earth the melted rock came from.

Another scientist is almost hidden in a cloud of gas near the vent. He's collecting samples of the gas. This can be dangerous work! Even though he has a gas mask on, the gases could become so thick that he couldn't breathe. But the gas samples are important: They help scientists estimate how much lava is still in the volcano.

I can see a friend of mine, Tina, standing on cool, hard lava at the edge of the lava river. She's holding a long metal rod that looks like a fishing rod. She dips it into the hot, flowing lava to take the lava's temperature.

I hold my breath as I remember a close call that Tina had recently: She thought she was standing on a bank of solid lava. But suddenly it cracked and started to split apart. As Tina leaped away, the place where she had been standing melted into the superhot lava river. If she hadn't moved so quickly, she could have fallen in and been badly burned or even killed. Today, though, she takes the river's temperature and calmly walks away.

The scientists also estimate the lava river's depth, its width, and its speed. They radio their findings back to the lab on top of Kilauea. On the helicopter radio I hear a scientist at the lab call them back: The measurements mean that *this* lava river might cause big trouble. It might flow over houses farther down the mountain.

(Continued on page 30)

I have to see the volcano's eruption firsthand. So I protect myself with a helmet and fireproof clothes, and climb into a helicopter (left). Then I hang on for a hot and scary ride (below).

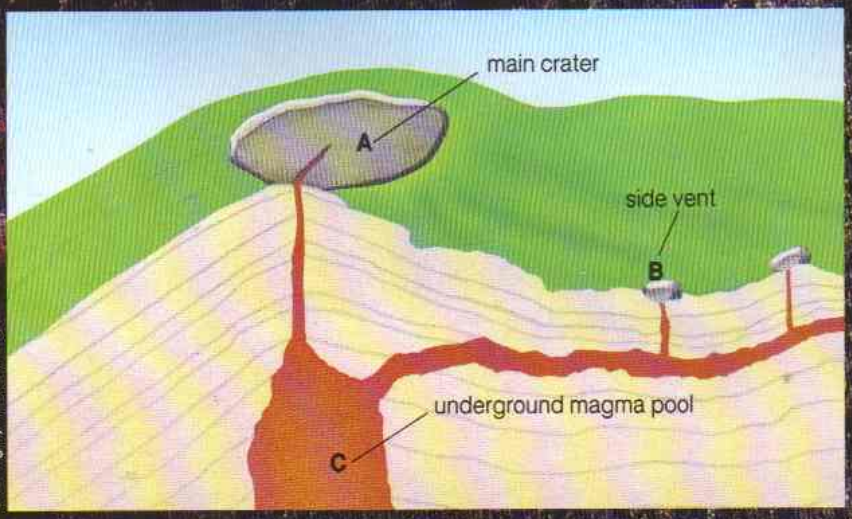
Photos by Bern Pedit (24-25); Caroline Evans; J.D. Griggs/U.S. Geological Survey

INSIDE KILAUEA

Kilauea is a broad and gently sloping volcano. It usually erupts quietly from a crater at the top (see A, in drawing below) or from openings on its sides (B, and in photo at right).

The drawing shows a cutaway view of the volcano. Deep inside Kilauea is a giant pool of magma, or superhot melted rock (C). The melted rock has to squeeze through cracks inside the mountain, and that causes small earthquakes. That's why the volcano shakes when magma is rising to the surface. If melted rock is thrown out of the mountain, the volcano roars.

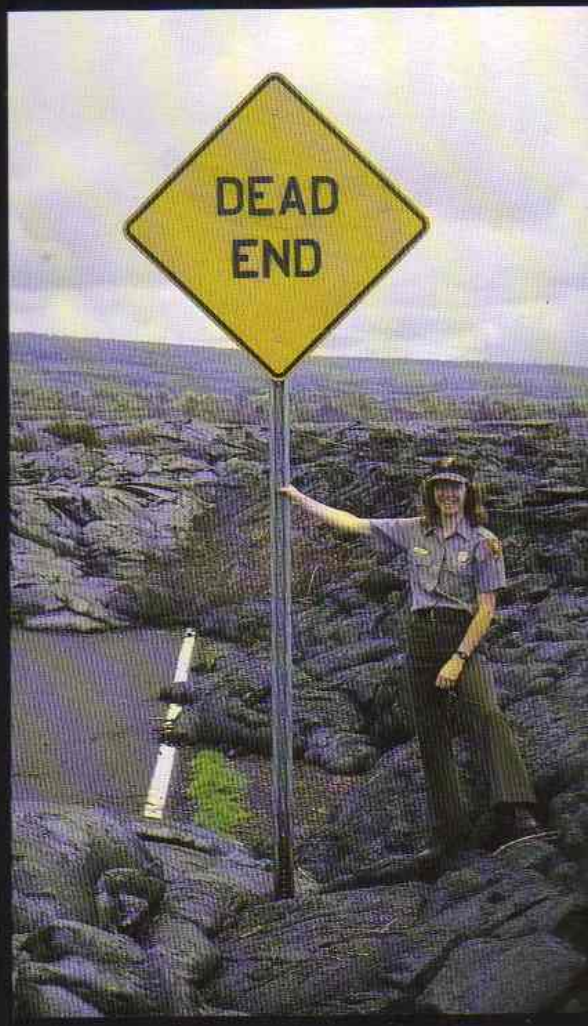
The melted rock, now called lava, flows down the mountain and burns or buries everything in its path. But as it cools and hardens, the lava becomes new land for the island of Hawaii.



Drawing by MedSciArtCo

Photos by Bob Seibert (28-29, 31T); Greg Vaughn; Caroline Evans

Lava is burying this road (far left) and making our sign (below) seem silly. But it gives this scientist (left) a chance to grab a red-hot sample to study.



Living With Lava

The pilot circles the helicopter around the fountain one more time, and then we fly down the mountain. The lava river is flowing slowly and seems a long way from houses and the highway. Still, I'm sure that people who live in its path are being warned now of the danger. And I wonder whether the kids are in school or at home helping their parents move their belongings to a safer place.

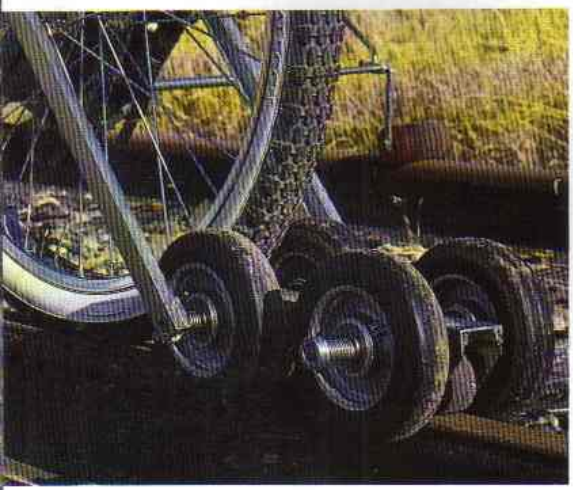
In the last few months lava has burned several houses that were in its path. I remember the kids I met who had lost their homes. They were brave. They knew their homes were gone forever, and they would be living with relatives for a while. But they love the island that Kilauea and the other four volcanoes have created. And they love to see Kilauea's beautiful eruptions.

The pilot heads the helicopter back to the top of the volcano, and we land smoothly near the visitors' center. I can see the parking lot is already filled with cars. People, curious about what Kilauea's been up to, are waiting for my report. So I quickly take off my flight helmet and head over to them. I have a lot to tell them about that fountain of fiery lava.

Mike Smart and his family have discovered a great way to travel: They ride special bikes that take them on a very different kind of bicycle trip.

When members of the Smart family want to travel, they head for an abandoned railroad track. They unload their special bikes (**photo above**) and go *railcycling*.

"It's a great way to go," says Mike, of Coeur d'Alene, Idaho. "Riding in a car gets *boring*. And riding a regular bike can be hard. (Mountain roads around here are steep!) But riding the rails is smooth and easy."



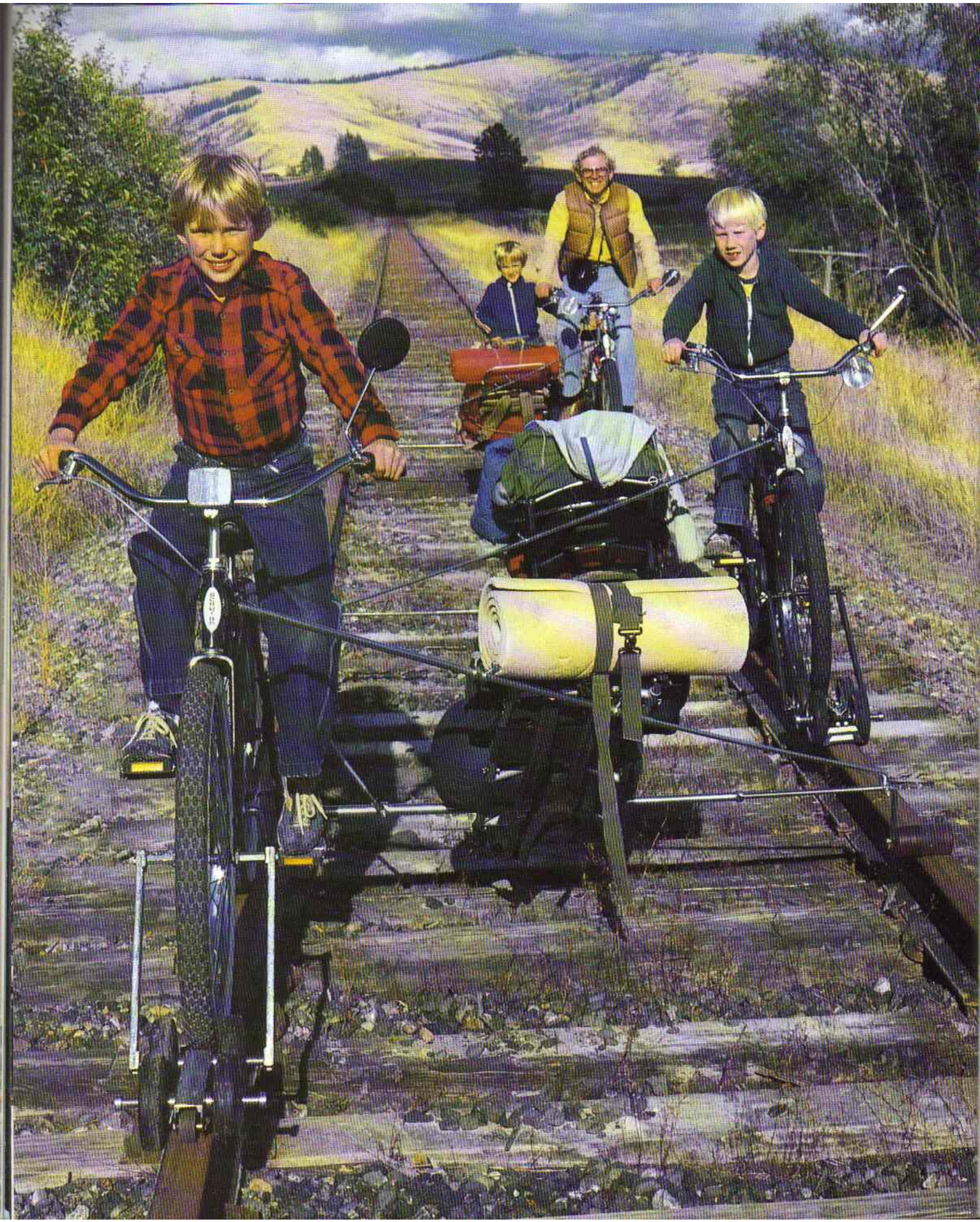
To make a railcycle, Mike added some small wheels (**left**) to the front of a bike. The wheels hold the bike in place on one rail. Then he attached an *outrigger* to the side of the bike. This set of poles reaches to the opposite rail to help balance the bike and carry supplies (**right**).

"To ride on the road, I flip the front wheels up out of the way," explains Mike. "Then I fold the outrigger against the side of the bike."

What

a Way to Go!

by Carolyn Duckworth
Photos by David Falconer



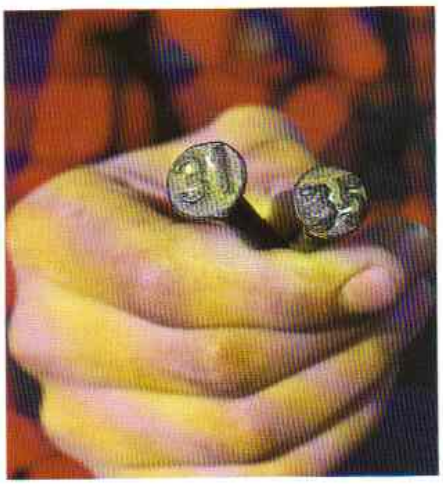
Railcycling is an easy way to travel. The tracks aren't steep, even in the mountains. And since the extra front wheels hold the bike on the rail, you don't have to steer. That way you can look at the scenery and the animals.

"The land on both sides of railroad tracks is a great place for animals to live," says Mike. "We've seen foxes, bears—even wolves!"

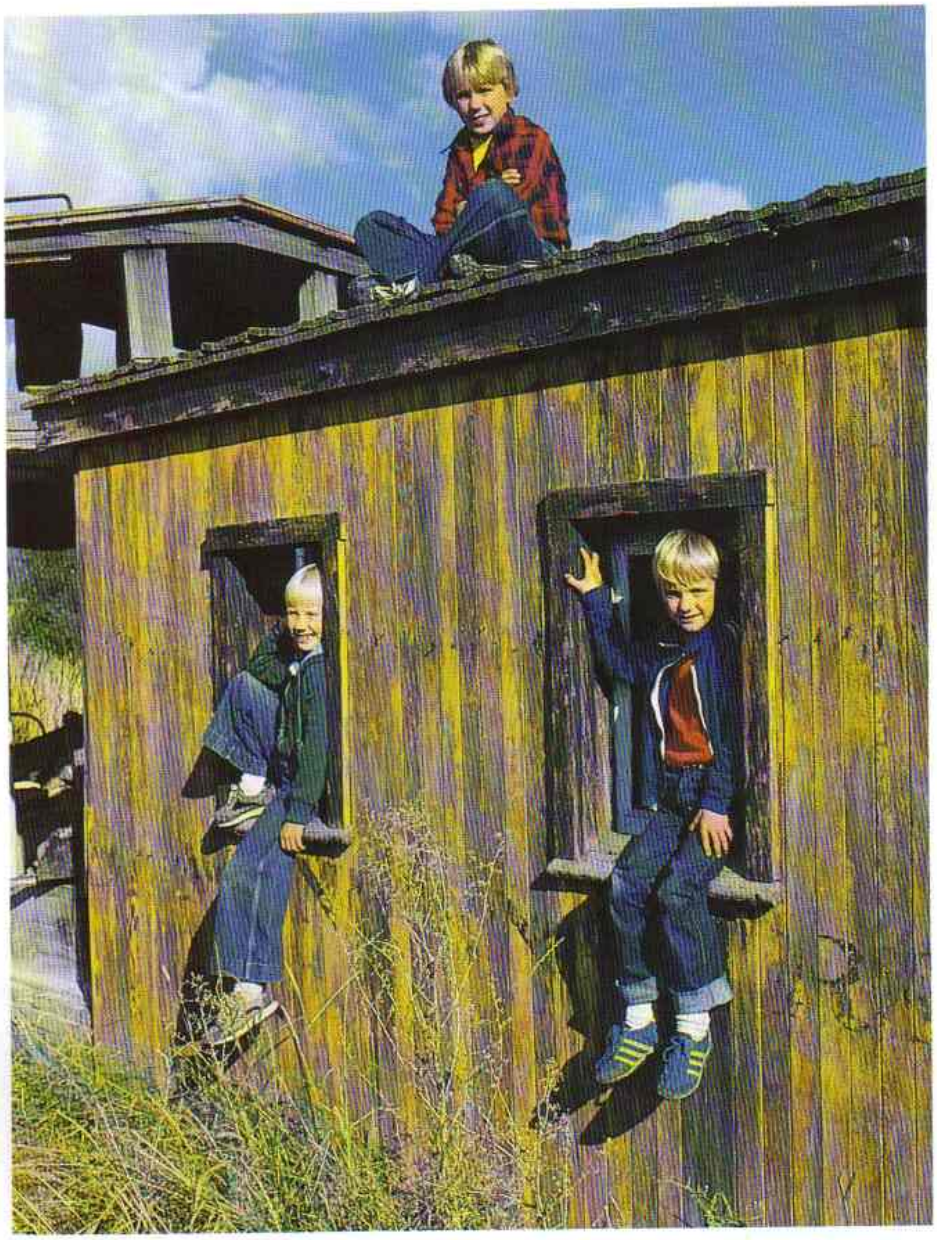
Mike's father, Dr. Smart, cautions that railcycling can be dangerous and illegal if you're not *very* careful. "A track may look old and unused, but it may not be abandoned," he explains. "So we always look in a guide to abandoned railroads. If the track isn't listed, we call the state railroad commission to find the owner."

"And we *always* have to call the owner of the railroad for permission," Mike adds. "Many companies won't let you ride on abandoned railroads. But we've been allowed to ride on quite a few rails near here. I hope other kids will find rails to ride near *their* homes. It's a great way to travel and see wildlife too!"

Rangers: For more information about railcycling, write to Smart Railcycles, Inc.; 3502 Buckskin Road; Coeur d'Alene, ID 83814. You can also write to Rail Riders; P.O. Box 1480; Hillsboro, NH 03244. To find out about another use for abandoned railroads, read about the Rails-to-Trails program in the March 1987 "Adventures of Ranger Rick." R.R.



Mike and his family railcycle to a campsite (far left). On the way they find a caboose to explore (below) and some nails that were used to put the tracks together (left). The nails were stamped with numbers that tell the years when the tracks were fixed.



Bubbling
up from the cool mud
of the soggy pond
I've come to squat a bit
in the sun, blinking,
to sing a plump song.

Bullfrog, me,
I might jump a fat jump,
plop down, pull in
a bug with a flick of
my tongue. Then—
plunk—I'll be gone.

—Bet Hennefrund

by Sy Montgomery

The Emus and Me

Our eyes met, and I knew I'd have to find out more about these big, wild birds.

I would have shouted for joy, but I didn't want to scare them away. Three funny-looking birds about my height were strolling through the dry Australian grass. It was the first time I'd ever seen a wild emu (EE-myoo). And now I had *three* looking at me!

The emus reminded me of haystacks with legs. Brown feathers that looked like hay hung in stringy clumps from their big round bodies, covering their stubby wings. Out from each emu body poked a periscope neck and head, ending in a goose-like beak.

For several minutes the emus bent their necks into S shapes and nibbled the grass. By the time they finally strolled away, I'd made up my mind. I decided to follow those funny-looking birds every time I saw them. I wanted to find out everything I could about them.

The wildlife refuge I was staying in was in the bush country or *outback*—a land of grass, short trees, and thick bushes in south and central Australia. I planned to camp there for five more months.

"That's a great idea—I'm glad you can stay awhile," the park ranger said when I told him my plans.

Watching and following the emus wasn't easy. Even though they can't fly, they can run as fast as deer—about 40 miles (65 km) per hour. And they're not always easy to see, either: Their brown bodies blend in well with the grass. Even so, I managed to see them almost every day.

At first I'd see the emus at a distance. But one day as I was walking along, I turned and saw all three of them standing nearby. One of them walked right toward me. I hadn't bargained for this! I was a little frightened. I'd read that emus can kick down strong wire fences with their powerful legs. And I didn't want those legs kicking in *my* direction!

The emu kept coming closer. It stopped and looked me in the eye, then ran away.

One by one, the other two did the same thing. After that, they must have decided that I was harmless, because from then on they let me get much closer to them.

Even though the emus were adult sized, I could tell they were still "teenagers." For one thing, they didn't have the colorful neck patches they would get as adults. The park ranger said they were about a year old, but there was no way we could easily tell whether they were male or female.

Emu Games

Just like human kids, these emu youngsters liked to play. On gusty days the wind was their plaything, and they would kick at the blowing breezes!

One of their favorite games was "Tease the Dog." The ranger kept a dog chained outside his house. The emus had learned that the dog could run only to the end of its chain. Whenever they came close, the dog would bark furiously.

One day I watched one of the emus walk right up to the dog and stop just out of its reach. It looked the dog straight in the eye, raised its stumpy wings, and stretched its neck out. It leaped into the air, kicking its feet. Its whole body seemed to say to the dog, *Nyah, nyah, nyah-nyah-nyah! You can't catch me!* Then the other two birds joined in, and the dog went absolutely wild.

When the birds had done enough teasing for one day, they sat down near the dog. Then they contentedly combed their feathers with their beaks.

Where, Oh Where Do They Sleep?

Over several months, I learned a lot about the emus. I followed them and wrote down what they ate (leaves, fruit, seeds, flowers, and insects). I kept track of how often they rested and how long they drank. I even drew maps of where they went.

Now the emus didn't seem so clumsy and funny-looking to me. In fact, I must have looked funny and clumsy to *them!* I often tripped over sticks and rocks while following them. But I'd never seen them stumble, not even once!

After all this time, there was one emu mystery I hadn't solved. As each day turned to night, the birds would start to trot faster. Then they'd run away from me at top speed.

Drawings by Pidgeon

This looked pretty funny, because as they ran, their long feathers wobbled from side to side. I would have laughed, but I was sad that they were leaving me behind.

Each night as I lay in my tent, I thought about the emus and wondered again where they slept. I even began to wonder whether they slept at all at night. *Could it be,* I asked myself, *that the rests they take during the day serve as sleep for them?*

Late one afternoon, only a few weeks before I had to leave Australia, the birds were unusually calm. They kept up a steady stroll, and I was able to stay right behind them. I was still keeping up with them when the sunset melted into a moonless night.

Suddenly they surprised me by stepping over a wire fence and into a grove of trees. I held my breath and listened.

Thump! They dropped to their knees just five feet (1.6 m) from me. *Thud!* They plopped onto their chests, their feet tucked under them. I listened to them combing their stringy feathers. Then all was silent—they had fallen asleep.

I thought about how lucky I was. It's not always easy to learn things about wild animals. But these emus had shared with me their world: their walks, their meals, and, at last, even their sleep!

MORE ABOUT EMUS

- Emus are the second-biggest birds in the world. Only ostriches are bigger. Adult emus are about 5½ feet (1.7 m) tall and weigh about 100 pounds (45 kg).
- A female emu lays as many as 15 dark green eggs in a flat, grassy nest. Each egg weighs about as much as a dozen chicken eggs. When she's done laying, she leaves for good. Her mate sits on the eggs for about eight weeks (**right**). Once in a while he gets up to look for food or water, but he never goes far.
- The striped young (**below**) can feed themselves when they're two days old. They can run and swim after one week. Their father protects them for six months, and they grow as big as adults by the age of one.

- Most wild animals steer clear of adult emus. But foxes, eagles, and dingoes (Australian wild dogs) will eat the eggs and young.
- Emus have amazing voices. A male emu grunts loudly. And a female showing off to a male blows up a pouch in her neck. Then she booms out a very loud, very low note!

Photos by Jean-Paul Ferrero/Auscape; A.N.T./NHPA

Who-O-O Knows?

Drawing by Lynn Munsinger

Dear Wise Old Owl,

I read that when a kangaroo is being chased by dogs, it may run into a river. If a baby kangaroo is inside its mother's pouch, will the baby drown?

Janelle Hickley
Blaine, MN

A mother kangaroo tries not to go in the water if there is a baby in her pouch. She will try to escape another way.

If the mother *has* to jump in, an older baby can probably crawl out of the pouch and swim on its own. A tiny baby may survive a few minutes underwater if it doesn't breathe in any water.

How much water does a watermelon have?

Danielle Leuschen; Hockley, TX

All living things have lots of water in them, Danielle. A person is 65% water, an elephant and an ear of corn are 70% water, and a watermelon is 93% water!

When I went to the zoo, someone told me that flamingos are fed carrot juice to keep their feathers pink. Is that true?

Stephanie Morgan; Garfield, NJ

It's true. Carrot juice contains a chemical that keeps the flamingos' feathers pink. Without this chemical the flamingos' feathers would fade to white.

Of course, *wild* flamingos don't drink carrot juice. Their pink color comes from a chemical in the tiny shrimplike animals they eat.

This morning I saw a big green moth hanging on the screen of my bedroom window. It had two feathery things on its head. What were they?

Bob Miller
Silver Spring, MD

Sounds as if you saw a male luna moth like the one on our back cover, Bob. The feathery things you saw were its *antennae* (an-TEN-ee).

Male moths use their antennae to pick up a special scent given off by female moths. (Moths don't have noses.) Their antennae are such good "sniffers" that they can smell a female from over two miles (3 km) away!

Fireflies fill my backyard with tiny starlike lights at night. Where do these fireflies go during the day?

Melissa Bemis; Elysian, MN

During the day fireflies rest under fallen leaves, in trees, in the grass—anywhere that's shady.

At night fireflies come out in search of mates. Each male firefly flashes its light in a special code. When a female of his kind sees this code, she flashes back. Then the male can find her and mate.

Do earthworms have eyes?

Drew Bell; St. Louis, MO

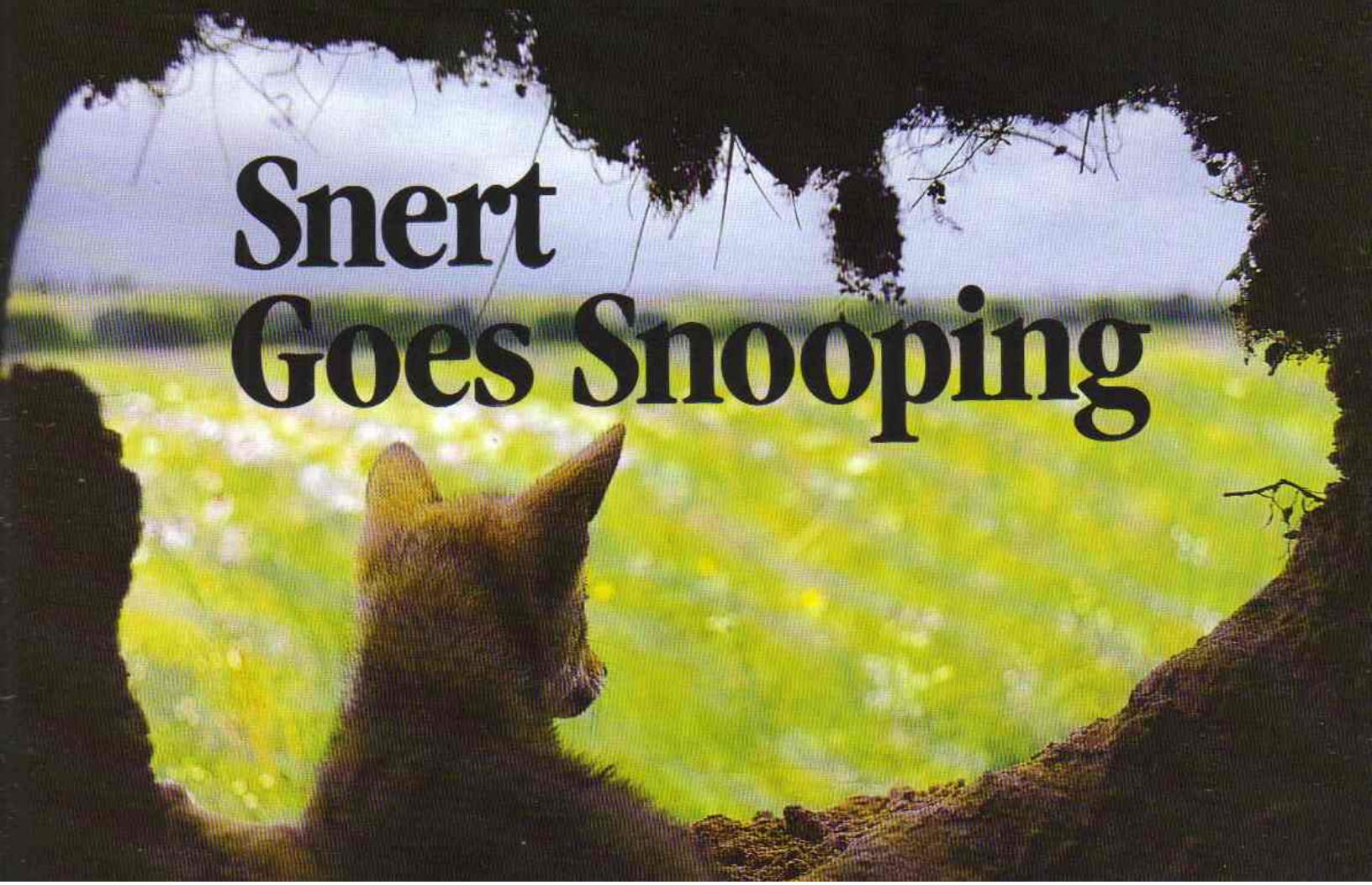
Earthworms don't have eyes like yours or mine, Drew. So they can't see shapes and colors the way we do. But they do have special cells all over their skin. These cells help earthworms tell the difference between light and dark. And that's important. If an earthworm accidentally wandered out of its dark burrow during the day, it could be eaten by a bird or get dried out by the sun.

W.O.O.

by Susan Tejada

Snert Goes Snooping

A young coyote named Snert peeks from his den on the prairie. What a tempting world out there—the sights, the sounds, the smells! How long can this curious pup keep from exploring on his own?



Aaarrrhhwoooo. At dawn a long, lonely howl floats over the prairie. *Aaarrrhhwoooo,* goes a second howl. *Yip, yip, yip. Yap, yap, yap.* The howling trails off. Two coyotes have just finished their early morning songs. Until evening falls and the howling starts again, it's time for the two coyotes to tend to other matters.

Snert, a six-week-old coyote pup, has heard his parents' singing. And now he peeks from the entrance of his underground den. He shares a cozy room at the other end of the den with his two sisters and two brothers. The pups look alike. Each is covered in fur that blends with the light brown colors of the prairie where they live.

Snert's mother, Luna, gave birth to her five pups in early spring. Soon after the pups were born, she had become nervous about possible dangers near her den. So she picked up the pups in her mouth, one at a time, and moved them from their old den to this one. Actually, this new den isn't *brand*-new. Luna had dug it out and raised another litter of pups in it last year. The den seems to be safe, but it does have one problem—fleas! To escape most of the pesky insects, Luna will move the pups again. In the meantime, Snert and the others spend a lot of time scratching.

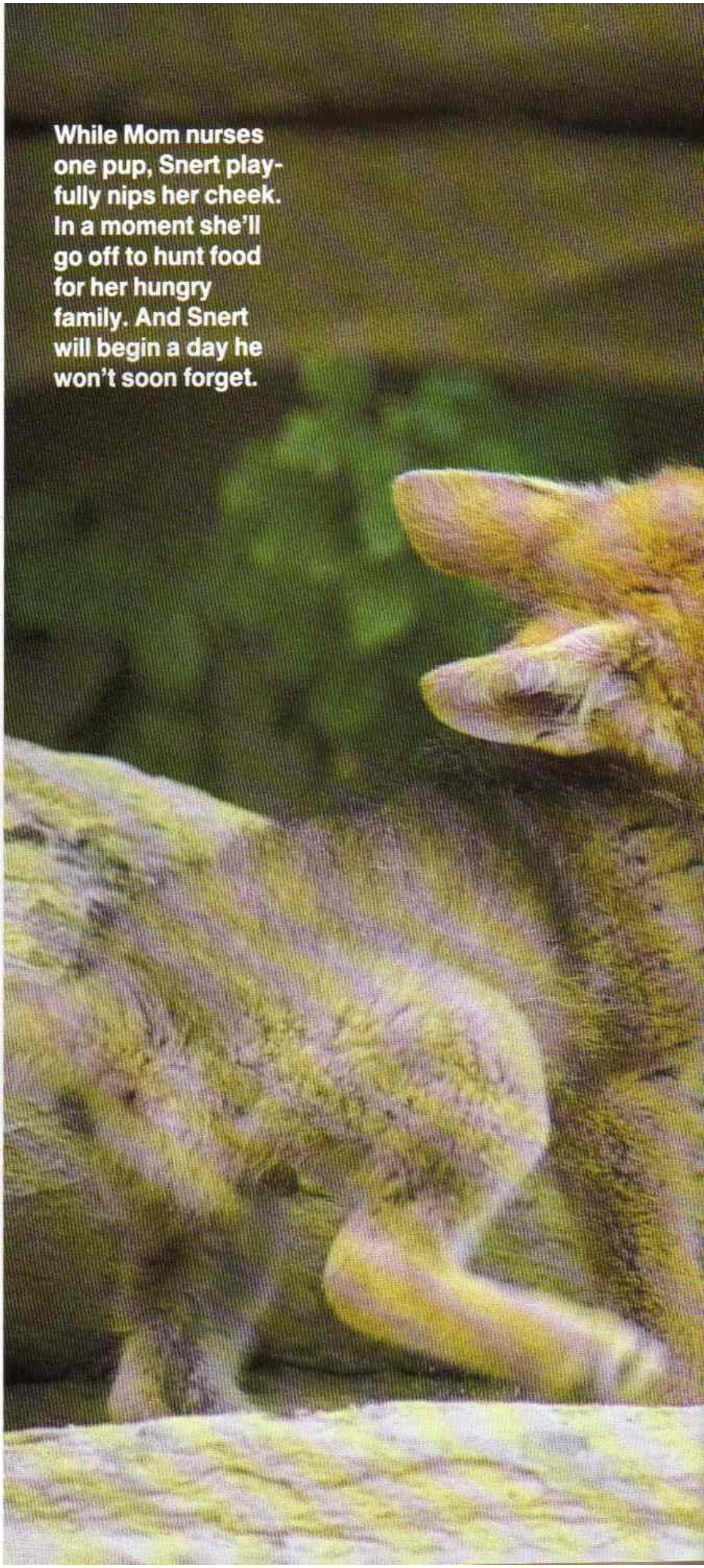
Growing Up Fast

Snert doesn't look or act at all as he did when he was born. Six weeks ago, he drank only his mother's milk. But now he can also eat semi-solid food. This is food that his mother has eaten first and then brought back up from her stomach. Six weeks ago, he weighed less than one pound (500 g). Today he weighs more than four times that much—well on the way to his full adult weight of about 35 pounds (16 kg). Six weeks ago, Snert's eyes were sealed shut and he was helpless. Today he has sharp eyesight and can race across the prairie.

A Wide-Open Playground

Snert and his brothers and sisters have begun to leave their den and tag along on hunting trips with Luna and their father, Riley. Snert watches them pounce on mice and run down rabbits and ground squirrels. He sees them zero in on dead deer by following the scent. He studies the way they catch frogs in a small pond and nibble berries off juniper plants. While he watches, he learns what to eat and how to get it when he grows up.

Of course, like most youngsters, Snert and his brothers and sisters don't *always* pay attention to their parents. Out on their "field trips" with Luna and Riley, the frisky pups have discovered that the open prairie makes a great playground. They wrestle. They play coyote versions of tag and hide-



While Mom nurses one pup, Snert playfully nips her cheek. In a moment she'll go off to hunt food for her hungry family. And Snert will begin a day he won't soon forget.

Photos by Glenn D. Chambers (41, 46); W. Perry Conway

and-seek. And they play with coyote toys—a chunk of antelope hide, a bone, a feather, or a sprig of sagebrush.

A Day for Snooping

Sometimes Luna and Riley go off to hunt on their own, either together or separately. Then the pups stay home, safely hidden inside the den.

One day, before leaving the den to look for food, Luna nurses her pups as usual. Then she vanishes, heading for a prairie dog town and, with luck, a prairie dog meal.

Snert takes up his usual post at the entrance to the den. His brothers and sisters are content to wait inside for Luna's return. But Snert is impatient and curious. He wants a coyote's-eye view of the prairie's wide open spaces.

What does he see? A jackrabbit bouncing through some wildflowers. A lizard scooting under a rock. A grasshopper hopping near the entrance to the den. So much activity! So many temptations! And the fleas inside the den are making life miserable. What's a curious coyote to do?

Neither parent is around to watch over him. But Snert feels like snooping anyway. All alone, he dashes out of the den and chases the grasshopper. He catches the insect, bats it around awhile, then drops it. Something else catches his attention . . . a

After playing with a grasshopper, Snert romps and rolls in a clump of wildflowers. What great fun! But Snert forgets one thing—his parents aren't watching over him.

clump of sweet-smelling prairie flowers. Like all coyotes, Snert likes strong smells, stinky or sweet. He tumbles around and around in the flowers.

What fun outside the den! Snert is having such a good time he doesn't notice something appear in the sky above him. It's a golden eagle circling over the prairie. And it has spotted the unsuspecting pup. The eagle flies back and forth above Snert. Then, with wings half closed, it begins its dive.

Target: Snert

The eagle zooms closer and closer. At last, the little coyote looks up and sees what's headed his way. Big trouble!

Snert leaps from his bed of flowers and dashes toward the den. Faster and faster he runs on his little legs. But the eagle is gaining on him. In a few seconds, the eagle will sink its sharp claws into the terrified coyote pup.

Suddenly an adult coyote tears through the prairie grass. It's Luna! Returning from her hunt, she had seen both the eagle and the pup from a distance. And now, with ear-piercing yelps, she comes on fast. Just before the bird strikes, Luna leaps up and chases it away. The eagle might have been able to handle little Snert, but not angry Luna. It flies off to look for an easier meal.

Still terrified, Snert dashes straight for home. His den may be full of fleas, but at least it's safe from eagles! *(Continued on next page)*

Photos by Larry Brock/Tom Stack & Assoc.; Pat Powell

A golden eagle spots the playful pup from high in the sky above. In an instant it will fold its wings and begin to dive. Target: Snert!

More About Coyotes:
Coyotes thrive on the prairie . . . and in many other parts of North America. Once, coyotes lived mostly in the West. Today they live from coast to coast—in deserts and forests, on mountains and plains, around swamps and marshlands, and even near cities. In the suburbs of Los Angeles, California, they sometimes lap water out of swimming pools!

Coyotes usually have no trouble finding food. Several may work together to kill a deer. But usually they hunt smaller prey such as rabbits and mice. They also eat animals they find dead. And they gladly eat frogs, insects, fruits, grass, garbage—just about anything.

For more about coyotes, see *Ranger Rick*, March 1985.

Luna follows close behind. And as she nears the den, the pups come out to greet her. Happy to see their mother again, they bound back and forth like puppy dogs. They wag their tails, lick Luna's face, chew at her ears, and tug at her tail. Then Luna brings up food from her stomach, and the pups get their first taste of prairie dog.

Snert and his brothers and sisters gobble down their meal. Then they curl up at the entrance to the den for a nap. Later, dusk will fall over the prairie, and again it will be time for the coyotes to howl.

Riley may give his pups a singing lesson tonight. The lesson will be an important part of learning about being a grown-up coyote. Coyotes seem to howl for different reasons: maybe to declare to other coyotes that "This is my territory!" Maybe to round up stray members of their family group. Maybe to find a mate. Maybe to warn each other of danger. Or maybe even to have a good time. Tonight the five pups will try to imitate their father's call. *Aaarrrhhwooooo, yip-yip, yap-yap.* But their high young voices will only squeal, not wail.

Finally the coyote family will fall asleep. And tonight one pup might dream more than usual—about grasshoppers and sweet-smelling flowers . . . and big birds that come swooping out of the sky.

Later, back in the den, Snert is about to take a nap with his brothers and sisters. Thanks to his mom, the young coyote has lived to go snooping some other day.

Dear Ranger Rick,

Recycling a Nest

One morning after a storm, I found two baby doves huddled together on the ground in my backyard. They had fallen out of the tree where their nest was. Doves don't build very strong nests, and the storm had destroyed theirs. I went inside to get a towel to pick them up with. Then I brought them inside and showed them to my mom.

We have a collection of old nests that fell out of trees during storms. So we decided to try putting the baby birds back into their tree in one of our nests.

When we were putting the baby doves into the nest, one of the parents stayed nearby. It tried to lure us away by pretending it had a broken wing. The trick didn't work on us, but it worked on our cat!

That night we had another storm and the doves fell out of the tree again! They were all right, but the nest was pretty beaten up. This time we got another nest and decided to sew it around the tree branch. It worked! The parents came back to feed their babies and care for them. Soon they grew up and flew away.

Allison Spengler, Age 11
Corpus Christi, TX

Thanks for helping the baby doves, Allison. A baby bird that falls out of its nest is easy prey for enemies. So if you find one, it's a good idea to gently put it back into its nest if you can. (The parents won't abandon the babies just because you touch them.) *R.R.*

Bones, Bones, Bones

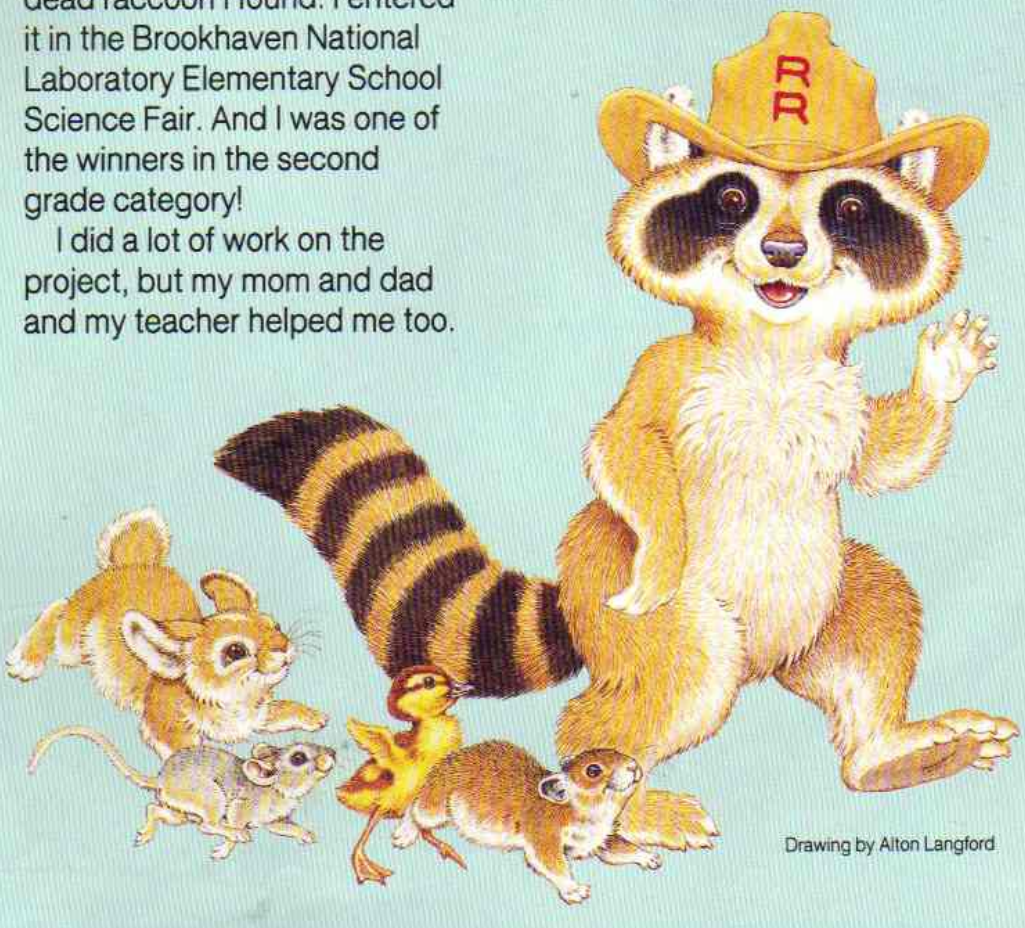
Last year I put together a skeleton from the bones of a dead raccoon I found. I entered it in the Brookhaven National Laboratory Elementary School Science Fair. And I was one of the winners in the second grade category!

I did a lot of work on the project, but my mom and dad and my teacher helped me too. I had to clean the bones. Then I did research to find out what a raccoon's skeleton should look like. Finally I put the bones together using wire, wax, glue, and string.

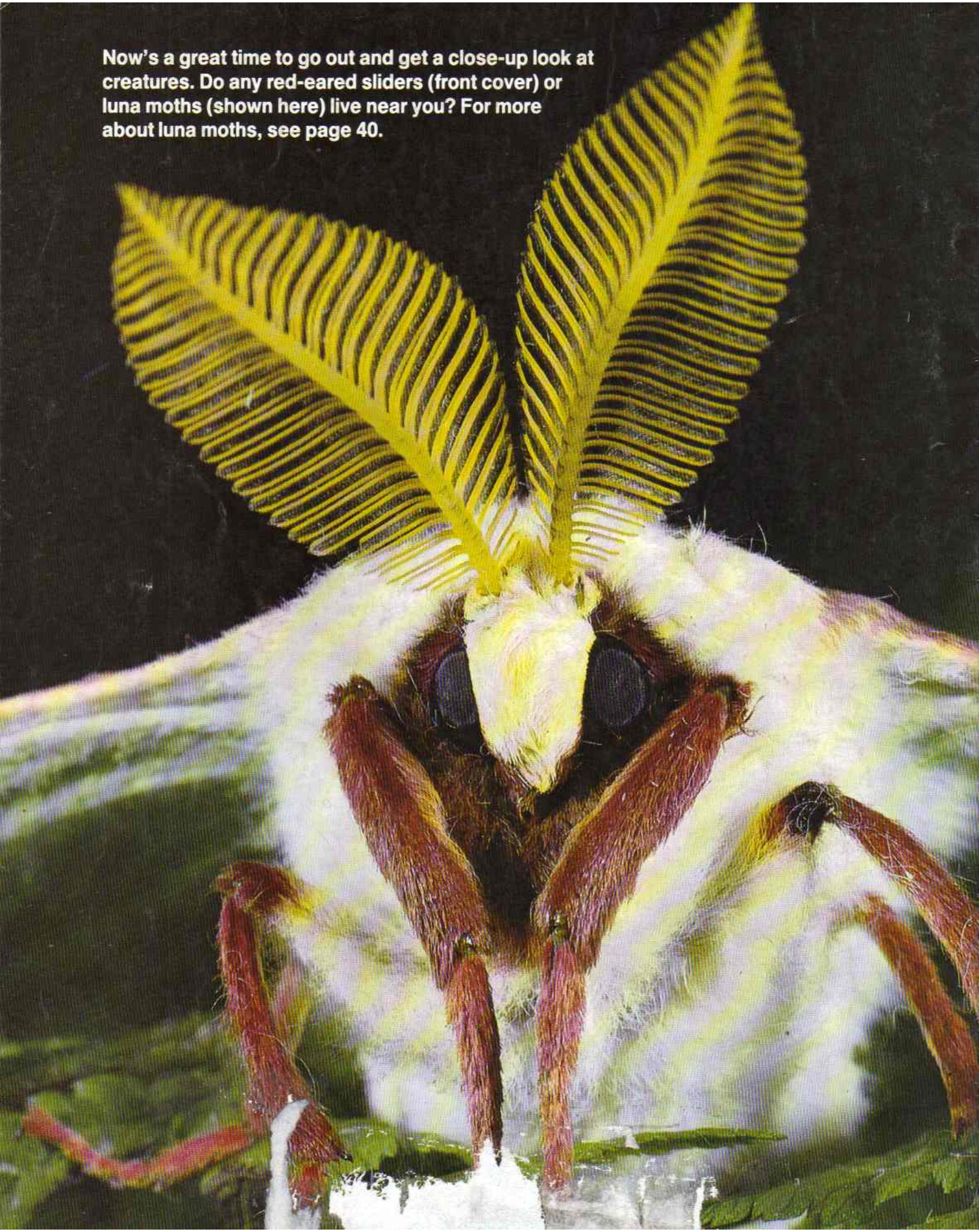
It was hard work, but I like science. I think I might like to be a scientist because it would be fun and very interesting too.

Andrew Slionski
Ronkonkoma, NY

Congratulations on winning in the science fair, Andrew. Looks as if you're already on your way to becoming a scientist! To read about another ranger who is interested in bones, see last month's "Dear Ranger Rick." *R.R.*



Drawing by Alton Langford



Now's a great time to go out and get a close-up look at creatures. Do any red-eared sliders (front cover) or luna moths (shown here) live near you? For more about luna moths, see page 40.